EST. 1999

# PRAIRIE CROSSING
## CHARTER SCHOOL

CREATING NATURAL LEADERS

# Accountability Report
# 2020-2021

# Prairie Crossing Charter School

Accountability Plan 2020-2021

Exhibit G

Part 5 – Education Elements

# Section A: Class Size

# Section A: Class Size

## 2020-2021

| Class | Number of Students |
|---|---|
| Kindergarten, Parker | 24 |
| Kindergarten, McKee | 24 |
| 1st, Smetters | 24 |
| 1st, Barnett | 24 |
| 2nd, Jeffery | 24 |
| 2nd, Mui | 24 |
| 3rd, Hahn | 24 |
| 3rd, Larson | 24 |
| 4th, McNally | 24 |
| 4th, Ottaviani | 24 |
| 5th, Neil | 24 |
| 5th, Psimaras | 24 |
| 6th, Wright | 24 |
| 6th, Turner | 24 |
| 7th, Hershiser | 24 |
| 7th, Stewart | 24 |
| 8th, Jackson | 23 |
| 8th, Flood | 24 |
| **Total** | **431** |

# Section B: Enrollment

## Admissions to Prairie Crossing Charter School

Prairie Crossing Charter School students are admitted in accordance with the state Charter Schools Law.  The application process begins in January when parents are encouraged to fill out an application which they can get at the office or from the school website.  After all applications have been submitted, returning students are given places as are their siblings if places are available.

Thereafter, admission is determined by a public lottery.  The lottery and admissions are on a non-discriminatory basis and open to all students regardless of race, ethnicity, gender, socioeconomic status, sexual orientation, religious preference or disability. All students are welcome to apply. Out-of-district students will only be admitted after all in-district student applications have been placed during the lottery process. After classes are filled, the lottery continues to create a waiting list for each grade.  The application policy and procedures referred to below reflect Prairie Crossing Charter School's intent to maintain integrity and clarity throughout the following admission process.

1.  Any student living in District 50 or 79 (in-district) is eligible for free admission to Prairie Crossing Charter School (PCCS). Out of district students are eligible on a tuition fee basis.

2.  The registration period runs from approximately January 1 to the last day of February each year.  During the time, PCCS sends information in English and Spanish to local newspapers, community service organizations, and other sources advising the community of opening at the school for the coming school year.

3.  During the registration period, families of current students are asked to inform the school as to whether the student(s) will return for the coming year.  These families are also asked to submit applications for any siblings who wish to attend the school, since siblings are given priority where space allows.

4.  Also during the registration period, applications are available online and at the school for any interested and qualified families.  These applications must be submitted to the school prior to the deadline, usually March 1.  Families with children on the current waiting list are contacted to determine whether they are interested in being in the lottery for the next school year.  Except as provided for in item #6, the waiting list is not maintained from year to year; a new waiting list is drawn each year.

5.  All new applicants to the school and families currently on the waiting list indicating their desire to have a child(ren) considered for admission will be given a receipt to document the school's acknowledgement of their application or restatement of their desire for their child(ren)'s admission to the school.

6.  At the end of the registration period, the school determines how many spaces are available at each grade level after returning students have been tabulated.  Priority for registration at each grade level is as follows: returning students, siblings of returning students, in-district applicants and finally out-of-district applicants.  If there are more siblings than can be accommodated at any given grade level that are on the current year's waiting list, they will remain on the list in the current order.  If there are new siblings to be added to the waiting list, their names will be drawn and added to the bottom of the current siblings' waiting list.

7.  Once places have been assigned to returning students and their siblings, students from the applicant pool are assigned to the various grade levels.  If there are more students than can be accommodated at a given grade level, a lottery is held among new students seeking admission to the affected grade levels, beginning at the highest grade level and moving to the lowest.  If

applicable, a final lottery is held in the same manner at each grade level for out-of-district applicants. They will be placed on the wait list immediately following the last in-district applicant previously drawn. If any student with siblings in the applicant pool is accepted, his or her siblings are automatically given priority as described above (i.e. the siblings are either accepted or added to the bottom of the waiting list of other siblings at the appropriate grade level).

8. All lotteries are held in public on a publicly disclosed date as soon as possible after the registration period has closed.  Each lottery is held by grade level and priority as described above.  Names from a pool of all applicants will be randomly selected to fill each grade level.  Additional applicants are placed on a waiting list in the order selected, maintaining a priority status for siblings.  Beginning with student enrollment for the 2015-2016 school year, the lottery must be administered and videotaped by the Executive Director, or designee. The authorizer or its designee must be allowed to be present or view the lottery in real time.  The Executive Director or designee must maintain a videotaped record of the lottery, including a time/date stamp. The Executive Director or designee shall transmit copies of the videotape and all records relating to the lottery to its authorizer on or before September 1 of each year.

9. If during the lottery procedure a name was left out of the drawing for the appropriate grade level, one of five scenarios will result.

    a. If the missing name is found before any other grades have been drawn, the lottery for that class is repeated with the name included.

    b. If the missing name is found after other grades have been drawn and no siblings are impacted, the lottery for the class from which the name was missing is repeated with the name included.

    c. If the missing name is found after other grades have been drawn and a student, Student A, was accepted into the class as a sibling because of the errant drawing, but is not a sibling based on the corrected drawing, the name of Student A and those of the students on the waiting list for that grade will be redrawn.  The purpose for this redraw is solely to place Student A in the waiting list.  Student A will be placed in the waiting list after the name of the student who is drawn immediately before he or she in the redraw.  The order of the other students on the waiting list will not change.  If Student A is drawn first, he or she will be accepted into the class unless the student at the top of the waiting list is a sibling of a student selected in the lottery.  In that case, the sibling is accepted into the class.  If not, the student whose name was first on the waiting list will be accepted into the class.

    d. If the missing name is found after other grades have been drawn and a student, Student A, was placed above other students on the waiting list as a sibling because of the errant drawing, but is not a sibling based on the corrected drawing, the name of Student A and those of the students on the waiting list for that grade will be redrawn.  The purpose for this redraw is solely to place Student A in the waiting list.  Student A will be placed in the waiting list after the name of the student who is drawn immediately before he or she in the redraw. The order of the other students on the waiting list will not change.  If Student A is drawn first, he or she will be placed first on the waiting unless the student at the top of the waiting list is a sibling of a PCCS student or a student selected in the lottery.  In that case, Student A will be placed on the waiting list immediately following any siblings of PCCS students or students selected in the lottery.

    e. If the missing name is found after other grades have been drawn and a student, Student A, was not accepted as a sibling in the errant drawing, but is a sibling in the corrected drawing, Student A will be placed in the spot he or she would have been if his or her status as a sibling had been known.  If student A is placed into the class, the last person placed in the class in the errant drawing will become the first person on the waiting list.  No other changes in the waiting list will occur.

10. If after the lottery a student, Student A, was found to have been left out of the drawing, the name of Student A and those of the students on the waiting list for that grade will be redrawn.  The purpose for this redraw is solely to place Student A in the waiting list.  Student A will be placed

in the waiting list after the name of the student after whom he or she is drawn.  The order of the other students on the waiting list will not change.  If Student A is drawn first, he or she will be placed first on the waiting unless the student at the top of the waiting list is a sibling of a PCCS student or a student selected in the lottery.  In that case, Student A will be placed on the waiting list immediately following any siblings of PCCS students or students selected in the lottery.  If Student A is a sibling, he or she will be placed in his or her appropriate spot based on his or her sibling status.

11. All affected families are advised of the results of the lottery as soon as possible in writing and on the website.

12. Students are moved up from the waiting lists as openings occur at their grade level.  When a family on the wait list is eligible to be offered a space, the school will contact the family to determine their interest in having the child attend the school.  The school will use three working days for contacting the family.  The family will be given three working days to notify the school of their decision to enroll from the date they are contacted by the school.  Those applicants who cannot be reached or who do not respond within this designated period of time will be removed from the wait list and will be required to reapply.  The spot will then be offered to the next applicant on the wait list.

13. No priority is given to any applicant to Prairie Crossing Charter School, except returning students, their siblings, and siblings of accepted students, as noted above and provided for in the Illinois' Charter Schools Law.


**Adoption Dates:**

Adopted:  November 15, 2005
Revised : May 2015 , January 2017

# Transportation Plan

The Prairie Crossing Charter School transportation plan is closely aligned with the school's size, environmental philosophy, dual district boundaries and finances. Door to door bus service for all students will not be offered, since the Charter Schools Law exempts Prairie Crossing from this requirement except for special needs students.

Prairie Crossing Charter School is situated at the far corner of each district. Its students may come from anywhere in a 63 square mile area. It simply cannot commit to door to door bus service. However, being committed to welcoming a diverse array of students from throughout the districts, Prairie Crossing Charter School will coordinate a car pool program designed to address the needs of families beyond walking or biking distance (which is greater than usual given a regional network of trails). The parents of children who are at risk or who are from low income families may be unable to take part in the car pool program. It is important to provide a means by which these children can attend Prairie Crossing Charter School. One of the principles on which the school is founded is the belief that children can learn to respect a diverse group of people by learning next to them and becoming friends with them. The following options will be provided for parents of at risk and low income children who wish to send their children to Prairie Crossing Charter School but cannot take part in the car pool program.

1. Parent volunteers will be sought to pick up and drop off the children whose parents cannot take part in the car pool program. In this way, these children will arrive at school in the same manner as other children and will not be singled out in any way that may make them feel different from other children attending the school.

2. If no parent volunteers can be found to pick up and drop off children and there are only a few children that need transportation, Prairie Crossing Charter School will hire a person to pick up and drop off these children using his or her car. In this case, Prairie Crossing Charter School would register with the Illinois Secretary of State as a School Bus Driver Employer. Prairie Crossing Charter School will insure that the person obtains and maintains a valid bus driver permit. This includes:
   A. an initial classroom course for school bus drivers;
   B. a minimum of two hours classroom training annually related to driving responsibilities;
   C. participation in a Federally required drug and alcohol testing program, possessing a valid and properly classified Commercial Driver's License (CDL) with a Passenger Endorsement and properly classified school bus driver permit;
   D. completion and certification of a passed annual physical examination on a form prescribed by and available from the Secretary of State's Office; and
   E. Criminal background check including fingerprinting through the Illinois State Police.

   Prairie Crossing Charter School will further insure that any vehicle used to transport children by an employee meets the requirements for a Division I vehicle. Under no circumstances will a Division II vehicle be used to transport students to and from school. All vehicles will have proof of adequate insurance on file at PCCS and will complete a safety inspection every six months at an Official Testing Station regulated by the Illinois Department of Transportation.

3. If the number of children needing transportation is large enough, Prairie Crossing Charter School will lease a school bus to transport the children to and from school.  The Director of Prairie Crossing Charter School or his/her designee will obtain documentation from the bus company insuring that the drivers used hold valid bus driver permits and that their buses are maintained and inspected as required.  In this case the Director of PCCS or his/her designee will do the following to insure the safety of school bus-transported children:
    A. Supervise school bus emergency evacuation drills for all bus-riding students on school property twice annually and maintain documentation;
    B. Insure classroom instruction in safe bus-riding practices by classroom teachers for all bus-riding students twice annually including the dangers in the loading and unloading zone and maintain documentation; and
    C. Insure that all bus-riding students have copies of bus-riding rules which include the consequences for gross disobedience or misconduct.

## Adoption Dates:

Adopted: December 2003

# Volunteer Policy

Prairie Crossing Charter School encourages the participation of the entire family in the education process and emphasizes the importance of a pledge to life-long learning. The parental role in achieving the Prairie Crossing vision is critical. This role can take many forms.

All parents are encouraged to provide a home atmosphere in which their children are supported in their educational goals. Frequent two-way communication between school and home is a hallmark of PCCS. This serves to keep parents informed of their children's progress and any special help they may need. It also provides an opportunity for the parents to discuss any questions or concerns with school personnel. Parents of Students are welcome to volunteer for many school activities in the classroom;

- as chaperones and drivers for field trips;
- as helpers in the maintenance of the school;
- as coaches, as participants in Parent Staff Organization (PSO);
- as members of the school board or its committees, task forces, etc.;
-  in contributing special talents and skills; or
- by providing financial contributions to the school.

However, no parent is required to volunteer at the school or provide financial contributions. Children will not be discriminated against in any way if parents are unable or choose not to volunteer or contribute financially. Volunteerism and financial contributions are not requirements for enrolling in or remaining at Prairie Crossing Charter School.

## Adoption Dates:

Adopted: November 2003

# Collection Student Instructional Fees

1. Instructional fees, including all tuition obligations for out of district students, for continuing students shall accompany a completed Enrollment Form. Both are due on or by June 30, of each year. Instructional fees are those fees charged to families because of their child's admission to, and enrollment in, Prairie Crossing Charter School.  These Instructional Fees are collected to support the general operating expenses of the School including, but not limited to, instructional materials, textbooks, and consumable supplies.

2. A lottery for open slots in each grade is held in accord with Board Policy# 500.6- admissions to Prairie Crossing Charter School.

3. Any continuing student who has not submitted a completed Enrollment Form accompanied by full payment of the instructional fee will be subject to having his/her slot filled by a waiting list student from the most recent lottery.

4. Instructional fees for new students (siblings of returning students and those who are selected in the lottery) are due on or by June 30 of each year.  Failure to comply with this deadline will result in assignment of the student's slot to a student on the waiting list.

5. The exclusionary provisions of this policy shall not pertain to those families who have requested and qualified for a Fee Waiver.

6. Any family unable to comply with the above deadlines must file a written request for an extension to a specified date, or for a payment plan. The PCCS Executive Director must receive this request no later than the applicable deadline for payment. Compliance with the agreed-upon extension or payment plan will be required in order for the student to begin school in the upcoming year. In no case will a student be allowed to begin attending school without payment of fees in full, or a valid payment plan, which was approved prior to June 30th, and a payment plan for which payments are current by the first day of attendance.

7. Should a family whose student is attending on the basis of a payment plan become delinquent in payments, that student's seat will be filled by a student on the waiting list at the conclusion of the trimester during which the account became delinquent unless by the last day of  the trimester the account has been paid in full or the family has filed a request for an appeal to  the Board of Directors.

8. The Board of Directors charges the administration with the responsibility to develop Rules and Regulations, by which the covenants of this policy shall be administered. The rules and regulations shall provide to families the right to  appeal to the Board of Directors the administration's decision to replace an existing student as a  result of a default on a payment plan or failure to make payment in full of Instructional Fees by  June 30th should a payment plan have not been established.

9. Prior to any child being denied admission under this policy, the School Director shall send to the parent/guardian not less than two certified letters over a fourteen day period in an attempt to notify the parent/guardian that failure to comply with the instructional fees policy will result in the child's non-admission to the school or the child's forfeiture of the child's current enrollment in the event of delinquency on a payment plan.

**Cross Reference:**
Policy# 500.6-Admissions to Prairie Crossing Charter School
Policy #800.3-Fee Waivers

**Adoption Dates:**

Adopted: February 2002
Revised and Adopted: July 2009

Policy:   800.3                                                                                    Business Procedures

## Prairie Crossing Charter School
## Fee Waiver Policy

**Definition of Instructional  Fees**

Instructional fee or fees mean any monetary charge collected by Prairie Crossing Charter School (PCCS) from a student or the parents or guardian of a student as a prerequisite for the student's participation in any instructional program of PCCS.  It is not defined as a fee when PCCS requires that a student provide his or her own ordinary supplies or materials (e.g. pencils, paper, notebooks) that are necessary to participate in any curricular or extracurricular program.

Prairie Crossing Charter School has a yearly books, materials, and activity fee of **$100** per child.  PCCS also charges fees for involvement in extracurricular activities and field trips.  School fees do not include library fines and other charges made for the loss, misuse, or destruction of school property; charges for the purchase of pictures; charges for optional travel undertaken by a school club or group of students outside of school hours; charges for admission to school dances, athletic events, or other social events; or charges for optional community service programs (e.g. before- and after-school child care and recreation programs).

**Students Eligible for Waiver**

Each child's instructional fee is due by July 1st each year.  For students that enroll in Prairie Crossing Charter School during the school year, this fee is due on their first day of attendance.  The due dates for fees for extracurricular activities vary and are provided to students interested in those activities.

Fees may be waived for students whose family income falls within the United States Department of Agriculture guidelines for free or reduced price lunch and breakfast.  Fees may also be waived for students whose families have suffered a significant loss of income due to death, severe illness, or injury in the family or unusual expenses incurred because of a natural catastrophe.  The **FY-12** Fee Waiver guidelines from the U.S. Department of Agriculture are not yet available and will be sent, to those making a request, as soon as we get them.

Any family unable to pay the books and materials,  or needing extra time to pay the fee should submit the form below to Prairie Crossing Charter School's Director **by June 30th** or the first day of attendance for students enrolling in PCCS during the school year.  For fees for extracurricular activities, due dates will be provided with the information about each activity.  The Director will process the request within thirty (30) calendar days and reply to the family with a payment plan, fee waiver statement, or denial of request.  PCCS's Director shall decide waivers on a case by case basis in a non-discriminatory fashion and shall rely upon documentation submitted by the applicant.  The Director's decision can be appealed to the School Board President.

Payment plans will be provided for students whose families do not qualify for fees to be waived but whose children would be prohibited from attending Prairie Crossing Charter School or taking part in extracurricular activities unless a payment plan is provided.  Explanation for payment plan requests will be reviewed by the Director as provided above.

**Notification to Parents/Guardian**

PCCS's policy for the waiver of instructional fees shall be communicated in writing to the parents or guardian of all students enrolled in the PCCS near the beginning of July with the first bill or fee notice sent and any other time a notice of fees (e.g. for extracurricular activities) is sent to parents. PCCS also will state in all of its notices sent to parents who owe instructional fees that PCCS waives fees for persons unable to afford them in accordance with its policy and the procedure for applying for a fee waiver. The Director's name, address, phone number, and email address will be included. A fee waiver application form also may be included with this notice when it is sent to parents. The notification will be in English, Spanish, or the home language of the parents, if it is needed to ensure their understanding of the district's policy (if translation of the notice is not feasible, PCCS will use interpreters, e.g. other students or neighbors). The notice shall describe:

- PCCS's policy, including the criteria and other circumstances under which PCCS will waive school instructional fees or provide a payment plan for these fees;
- the instructional fees subject to waiver under the district's policy;
- the procedure to be used by parents in applying for a waiver of instructional fees;
- the procedure to be used by parents in resolving disputes concerning the waiver of instructional fees.

If the fee waiver policy and/or procedures are substantively amended, then parents of students enrolled in PCCS shall be notified in writing within thirty (30) calendar days following the adoption of the amendments.

**Resolution of Disputes**

If PCCS denies a request for a fee waiver or payment plan, then it shall mail a copy of its decision to the parents within thirty (30) calendar days of receipt of the request. The decision shall state the reason for the denial and shall inform the parents of their right to appeal, including the process and timelines for that action. The denial notice shall also include a statement informing the parents that they may reapply for a waiver or payment plan at any time during the school year, if circumstances change.

An appeal shall be decided within thirty (30) calendar days of the receipt of the parents' request for an appeal. Parents shall have the right to meet with the President of the PCCS Board of Directors, who will decide the appeal, in order to explain why the fee waiver or payment plan should be granted. If the appeal is denied, then PCCS shall mail a copy of its decision to the parents. The decision shall state the reason for the denial.

No fee shall be collected from any parent who is seeking an instructional fee waiver in accordance with PCCS's policy until the district has acted on the initial request or appeal (if any is made), and the parents have been notified of its decision.

**Confidentiality**

School records that identify individual students as applicants for or recipients of instructional fee waivers are subject to the Illinois School Student Records Act (105 ILCS 10/1 et seq.). Information from such records is confidential and may be disclosed only as provided in the Act.

**Prohibition Against Discrimination or Punishment**

No discrimination or punishment of any kind, including the lowering of grades or exclusion from classes, will be exercised against a student whose parents or guardians are unable to purchase required textbooks or instructional materials or to pay required fees.


Adoption Dates: 20 April 2004
Amended: 22 May 2007
Revised and Adopted 1 September, 2009

**Request for Fee Waiver or Fee Payment Plan**
**Please submit by June 30**


Student's Name: _____

Student's Grade: _____

Parents' Names: _____

Address: _____

_____

Phone Number: _____

Email: _____

☐ I/We request a payment plan for our books and materials.

☐ I/We request a waiver of the books and materials.

Please provide a brief explanation of the reason you are requesting a payment plan or waiver of fees. The Director is the only person who will see the reason for which you are requesting a payment plan or waiver of fees. _____

_____

_____

_____

_____

_____


Please mail to: Prairie Crossing Charter School
Atten: Executive Director
1531 Jones Point Road
Grayslake, IL 60030-3536

# Section B: Lottery

Prairie Crossing Charter School
Lottery Results
2004-2022

| | Total # of Applicants | Total # accepted | # of siblings of returning students | # of Out of District Applicants | Woodland 50 Applicants | Fremont 79 Applicants |
|---|---|---|---|---|---|---|
| 2004-05 | 188 | 43 | 22 | 4 | N/A | N/A |
| 2005-06 | 211 | 42 | 37 | 10 | N/A | N/A |
| 2006-07 | 229 | 44 | 36 | 4 | 185 | 40 |
| 2007-08 | 188 | 74 | 33 | 14 | 150 | 24 |
| 2008-09 | 185 | 52 | 29 | 20 | 151 | 26 |
| 2009-10 | 182 | 40 | 27 | 19 | 127 | 36 |
| 2010-11 | 198 | 39 | 28 | 27 | 137 | 31 |
| 2011-12 | 205 | 44 | 17 | 19 | 148 | 38 |
| 2012-13 | 238 | 44 | 19 | 31 | 173 | 34 |
| 2013-14 | 191 | 44 | 26 | 24 | 150 | 17 |
| 2014-15 | 165 | 51 | 29 | 20 | 133 | 12 |
| 2015-16 | 166 | 46 | 27 | 11 | 142 | 13 |
| 2016-17 | 156 | 48 | 30 | 6 | 131 | 19 |
| 2017-18 | 221 | 48 | 28 | 31 | 169 | 21 |
| 2018-19 | 263 | 49 | 29 | 49 | 187 | 27 |
| 2019-20 | 262 | 49 | 33 | 56 | 180 | 26 |
| 2020-2021 | 244 | 48 | 16 | 63 | 159 | 22 |
| **2021-2022** | 232 | 48 | 19 | 55 | 140 | 18 |
| **2021-22** Kindergarten No other grade level openings | 83 | 48 | 14 | 14 | 47 | 8 |

Link to the Website 2021-2022 school year wait list, this wait list is updated as changes happen.

# Kindergarten Lottery Registration Form 2021-2022

* Required

Email *

Your email



EST. 1999

**PRAIRIE CROSSING**
CHARTER SCHOOL

CREATING NATURAL LEADERS
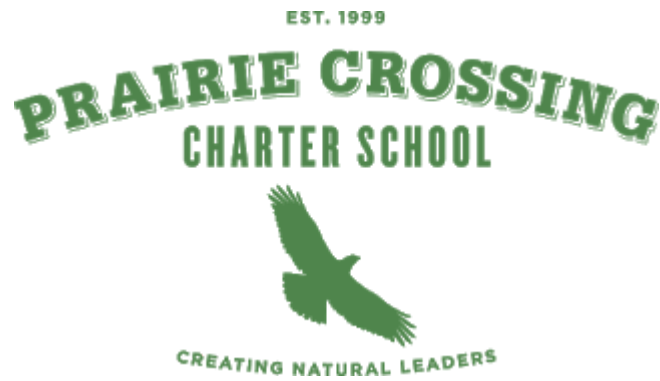
## Registration for the 2021-2022 Lottery Instructions:

Kindergarten Registration form 2021-2022 Lottery Instructions:

1. Complete form only for new students applying for the lottery(Not for current students already attending PCCS).

2. Parents/Guardian must electronically complete/submit or come to the office for a paper form(forms can be mailed upon request). Forms must be submitted by 12:00 PM. on February 28, 2021 in order to be included in the lottery on March 2, 2021.

3. You will receive a confirmation receipt of the registration by email.  If you don't receive an email from the school within 3 days of submitting the form, please contact Janette Siegel @ 847-548-1938.

4. After the Lottery has been conducted you will receive a mailed letter confirming that your child has been drawn for an open seat or that your child has been placed on the wait list(the wait list will be posted on our Website).

5.  When your child's name is drawn and you accept the open seat, PCCS will require:
        --  Your signed confirmation letter that you have accepted the seat,
        --  3 items showing Proofs of Residency (E.g. Utility Bill, Rental Agreement, Tax Bill) and
        --  Your child's birth certificate (your child must be 5 years of age on/before Sept 1st in order to enter Kindergarten).

Once these are received your child will be included in the 2021-2022 School Year Registration/Enrollment process.

Admission is on a non-discriminatory basis and open to all students regardless of race, ethnicity, gender, socioeconomic status, sexual orientation, religious preference or disability.  Prairie Crossing Charter School provides a full complement of services for students with disabilities, students with Limited English Proficiency, and offers transportation assistance for all students via carpools and private services. Instructional fee waivers are available for families whose income level qualifies based upon federal standards provided by the U.S. Department of Agriculture. We are a free public school that provides a personalized Kindergarten through 8th Grade education for students that reside in the Woodland (50) and Fremont (79) Districts.

Applicant's Last Name *

Your answer

Applicant's First Name *

18

Your answer

## Applicant's Middle Name

Your answer

## Applicant's Date of Birth *

Your answer

## Applicant's District of Residence *

○ Woodland School District #50

○ Fremont School District #79

○ We live outside of both District #50 and District #79

○ Other:

## I am confirming what school district I reside in. Please provide the district name and number. *

Your answer

## I am confirming that for the 2021-2022 school year my child will be entering: *

○ Kindergarten

○ 1st Grade

○ 2nd Grade

○ 3rd Grade

○ 4th Grade

○ 5th Grade

19

○ 6th Grade

○ 7th Grade

○ 8th Grade

Do you currently have a child/children attending Prairie Crossing Charter School? *

○ Yes

○ No

Do you have other children applying for the lottery? Please fill out a separate form for each child applying. *

○ Yes

○ No

If you have other children applying for the lottery, please provide their name and grade level for the 2021-2022 school year

Your answer

Father's Name *

Your answer

Father's Address (street, city and zip code) *

Your answer

20

Father's Cell Phone *

Your answer

Father's Home Phone *

Your answer

Father's Email Address *

Your answer

Mother's Name *

Your answer

Mother's Address *

Your answer

Mother's Cell Phone *

Your answer

Mother's Home Phone *

Your answer                                    21

**Mother's Email Address** *

Your answer

**Where did you hear about Prairie Crossing Charter School?** *

☐ Friend

☐ Newspaper

☐ Online

☐ Schools

☐ Daycare

☐ Other

**By checking this box, I confirm and agree that all of the information provided on this document is true and accurate.** *

◉ Yes, use this as my electronic signature

◉ No, I will come into the office to sign this form

A copy of your responses will be emailed to the address you provided.

Submit
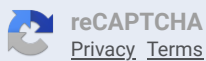
Never submit passwords through Google Forms.

# Formulario de Inscripción para la Lotería de Jardín de infancia 2021-2022

* Required

Email *

Your email
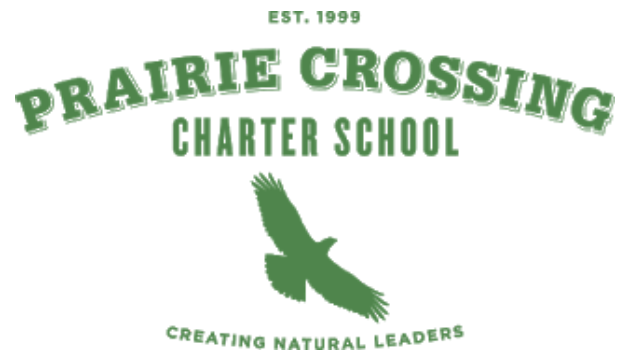
## Inscripción para la Lotería 2021-2022 Instrucciones:

Registro del Jardín de infancia 2021-2022 Instrucciones de la Lotería:

1. Completa el formulario sólo para los nuevos estudiantes que solicitan la lotería (No para los estudiantes actuales que ya asisten al PCCS).

2. Los padres / guardianes deben completar / enviar electrónicamente o venir a la oficina para un formulario de papel (los formularios se pueden enviar por correo a petición). Los formularios deben enviarse antes del mediodía del 28 de febrero de 2021 para ser incluidos en la lotería el 2 de marzo de 2021.

3. Usted recibirá un recibo de confirmación de la inscripción por correo electrónico. Si no recibe un correo electrónico de la escuela dentro de los 3 días siguientes a la presentación del formulario, comuníquese con Janette Siegel al 847-548-1938.

4. Después de que se haya llevado a cabo la lotería, recibirá una carta enviada por correo confirmando que su hijo ha sido
dibujado para un asiento abierto o que su hijo ha sido colocado en la lista de espera (la lista de espera será publicada en nuestro sitio web).

5. Cuando el nombre de su niño es dibujado y usted acepta el asiento abierto, PCCS requerirá:
    - Su carta de confirmación firmada que usted ha aceptado el asiento,
    -3 artículos que demuestran las pruebas de residencia (E.g. factura de servicios públicos, contrato de alquiler,
    - Certificado de nacimiento de su hijo (su hijo debe tener 5 años de edad el / antes del 1 de septiembre para ingresar al Kindergarten).

Una vez que se hayan recibido, su hijo (a) será incluido en el proceso de matrícula / inscripción del año escolar 2021-2022.

La admisión es no discriminatoria y está abierta a todos los estudiantes, independientemente de su raza, etnia, género, condición socioeconómica, orientación sexual, preferencia religiosa o discapacidad. Prairie Crossing Charter School ofrece un complemento completo de servicios para estudiantes con discapacidades, estudiantes con dominio limitado del inglés, y  PCCS utiliza un sistema de vehículo compartido para el transporte y servicios privados. Las exenciones de tarifas educativas están disponibles para las familias cuyo nivel de ingresos califica según las normas federales proporcionadas por el Departamento de Agricultura de los Estados Unidos. Somos una escuela pública gratuita que brinda educación personalizada desde el jardín de infantes hasta el octavo grado para estudiantes que residen en los distritos de Woodland (50) y Fremont (79).

Apellido del Solicitante *

Your answer

Nombre del solicitante *

Your answer

## Segundo nombre del solicitante

Your answer

## Fecha de Nacimiento del Solicitante *

Your answer

## Distrito de Residencia del Solicitante *

○ Distrito Escolar # 50 de Woodland

○ Fremont Distrito Escolar # 79

○ Vivimos fuera del Distrito # 50 y Distrito # 79

## Estoy confirmando que para el año escolar 2021-2022 mi hijo entrará: *

○ Jardín de infanciation (Kindergarten)

○ Primero Grado (1st)

○ Segundo Grado (2nd)

○ Tercero Grado (3rd)

○ Cuarto Grado (4th)

○ Quinto Grado (5th)

○ Sexto Grado (6th)

○ Séptimo Grado (7th)

○ Octavo Grado (8th)

## Do you currently have a child/children attending Prairie Crossing Charter School? *

○ Yes

○ No

¿Tiene otros niños solicitando la lotería? Por favor llene un formulario separado para cada niño que solicita. *

○ Sí

○ No

Si tiene otros niños solicitando la lotería, por favor proporcione su nombre y grado para el año escolar 2021-2022

Your answer

Nombre del Padre *

Your answer

Dirección del padre (calle, ciudad y código postal) *

Your answer

Teléfono Celular del Padre *

Your answer

Teléfono del padre *

Your answer

Dirección de correo electrónico del padre *

Your answer

Nombre de la madre *

Your answer

Dirección de la madre *

Your answer

Teléfono celular de la madre *

Your answer

Teléfono de la casa de la madre *

Your answer

Dirección de correo electrónico de la madre *

Your answer

¿Dónde se enteró de Prairie Crossing Charter School?

☐ Amigo

☐ Periódico

☐ En línea

27

☐ Escuelas

☐ Guardería

☐ Otro

---

Estoy confirmando en qué distrito escolar resido. Por favor proporcione el nombre y número del distrito. *

Your answer

---

Al marcar esta casilla, confirmo y acepto que toda la información proporcionada en este documento es verdadera y precisa. *

○ Sí, utilizar esto como mi firma electrónica

○ No, entraré a la oficina para firmar este formulario

---

A copy of your responses will be emailed to the address you provided.

Submit
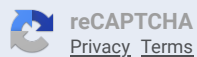
Never submit passwords through Google Forms.

# Section B: Outreach

**2020-2021 Outreach Outcomes for Accountability Report**

Prairie Crossing has been focused on a renewed emphasis on creating a more robust outreach plan to engage a more diverse population of families interested in PCCS. Diversity of our students has increased by 112% since 2013 with 29 native languages now being spoken at PCCS. Since 2014, students that are educationally disadvantaged and/or considered "at-risk" have increased from 32% in 2013 to over 62% in 2020.

Our outreach plan consisted of Organizational Initiatives, Evaluations of our Lottery, Assessment of our Transportation Plan, and Expanding our Outreach Methods.

PCCS convened a Lottery Taskforce to assess the feasibility of amending our lottery protocol to increase the opportunities for educationally disadvantaged individuals to attend PCCS. This taskforce explored whether weighted lotteries could be conducted at PCCS; the Commission stated that weighted lotteries were not permitted in Illinois Charter Schools at this time.

**Lottery Evaluations & Recommendations**

This marks our third year with the streamlined lottery application, with parents asked to complete a one-page form but not required to submit supporting documentation until after their child is selected through the lottery. This year, we received 232 lottery and wait list applications for the 2020/2021 school year.

- 14 of the 48 openings for the 2020-2021 school year were filled by sibling preference, with 34 seats eligible to the remaining applicants. Of the 232 applicants 50 are applying from outside of District 50 or District 79. We received applications from 16 different districts, 3 Out of state, CPS and children that are Homeschooled

Through these efforts, our Lottery numbers for Out of District have gone up substantially, with 53 applications for our 2021 Lottery.

To accommodate families requiring transportation our transportation plan implements a two-pronged approach for meeting those needs. A carpool system that continues to be the transportation plan for our students. PCCS has taken an active role in the process, working in close contact with new families to aid them in securing a carpool to mitigate their transportation needs. Additionally, PCCS has an annual budget which allocates $30,000 for alternate transportation needs through 3rd Party transport companies. There are currently 3 students who employ that alternate transportation, through a private busing company. Additionally, PCCS has waived or significantly reduced the cost of aftercare services to assist a few families who have benefitted from this support in order to pick up their children later in the day.

Regarding **Organizational Initiatives**, PCCS focused on ensuring that all written materials, both in marketing and outreach, were available in Spanish and English. Further, the school website, lottery forms, and all enrollment policies are available in English and Spanish. Additionally, PCCS has increased its visibility through our social media platforms, including Facebook, Instagram and Twitter; these forms of social media have made us more accessible to people in incalculable ways.

Typically, to expand our outreach, PCCS engages with several community and environmental-based organizations to increase our visibility and deepen our partnerships with the larger community. Some of our connections within Lake County and beyond have included:

- Supporting the community through a number of annual events:
    - School Supply Drives,
    - Bus to Us program with Waukegan Public Library and Waukegan schools,
    - Community Craft Fair,
    - One Earth Film Festival.
    - Academy of Global Citizenship,
    - College of Lake County and
    - LEARN Charter School-North Chicago

However, this past school year, for safety reasons related to the pandemic, we were extremely limited in offering our spaces on campus for the public events we typically have. Instead, we pivoted to offer virtual opportunities for prospective families. These included:

- Increased visibility in print ads and media,
- Virtual open houses,
- Zoom Town Hall meetings,
- Social media events via Facebook Live,
- Held Blood drives to assist the Lake County Health Department,
- "Adopted" children in need through the Holidays through a gift giving,
- Held food drives and
- Presented educational Seminars virtually in conjunction with ISBE and the Green Schools National Network.

In FY22, we anticipate an emphasis on strengthening these partnerships and our continued involvement in the school,  local and regional community. Additionally, we will continue to hold events through various committees and workgroups, all with a common goal to increase involvement, understanding and partnership within our school community and beyond to the broader community and to attract at-risk students to our school.

# Section C: Enrollment of Students with Disabilities

| | Primary Disability | Secondary Disability | Related Service(s) | Dismissed from Services 2020-2021 |
|---|---|---|---|---|
| 1 | Emotional Disability (K) | | Social Work | |
| 2 | Specific Learning Disability (D) | | None | |
| 3 | Other Health Impairment (L) | | Speech/Language, Social Work | |
| 4 | Specific Learning Disability (D) | | Social Work | |
| 5 | Other Health Impairment (L) | | Occupational Therapy | |
| 6 | Specific Learning Disability (D) | Speech and/or Language Impairment (I) | Speech/Language | |
| 7 | Developmental Delay (N) | | None | |
| 8 | Speech and/or Language Impairment (I) | | None | |
| 9 | Developmental Delay (N) | | Occupational Therapy | |
| 10 | Developmental Delay (N) | | Social Work | |
| 11 | Other Health Impairment (L) | | Social Work, Occupational Therapy | |
| 12 | Other Health Impairment (L) | | None | |
| 13 | Speech and/or Language Impairment (I) | | None | |
| 14 | Other Health Impairment (L) | | None | |
| 15 | Other Health Impairment (L) | | Social Work | |
| 16 | Speech and/or Language Impairment (I) | | Speech/Language | |
| 17 | Specific Learning Disability (D) | | None | |
| 18 | Specific Learning Disability (D) | | Occupational Therapy | |
| 19 | Specific Learning Disability (D) | | None | |
| 20 | Specific Learning Disability (D) | | None | |
| 21 | Specific Learning Disability (D) | | None | |
| 22 | Autism (O) | | None | |
| 23 | Emotional Disability (K) | | Social Work | |
| 24 | Emotional Disability (K) | | Occupational Therapy, Behavioral Intervention | |

| | Primary Disability | Secondary Disability | Related Service(s) | Dismissed from Services 2020-2021 |
|---|---|---|---|---|
| | | | Plan, Aide-Class, Social Work, Transportation, School Health Services | |
| 25 | Speech and/or Language Impairment (I) | | None | |
| 26 | Specific Learning Disability (D) | | None | |
| 27 | Other Health Impairment (L) | | None | |
| 28 | Developmental Delay (N) | | None | |
| 29 | Multiple Disabilities (M) | | Speech/Language, Occupational Therapy, Occupational Therapy, Physical Therapy, Social Work, Social Work | |
| 30 | Speech and/or Language Impairment (I) | | None | |
| 31 | Speech and/or Language Impairment (I) | | None | x |
| 32 | Hearing Impairment (F) | Other Health Impairment (L) | Audiology, Hearing Itinerant | |
| 33 | Specific Learning Disability (D) | | Occupational Therapy, Occupational Therapy | |
| 34 | Developmental Delay (N) | | Speech/Language, Occupational Therapy | |
| 35 | Speech and/or Language Impairment (I) | | None | |
| 36 | Speech and/or Language Impairment (I) | | None | x |
| 37 | Specific Learning Disability (D) | | None | |
| 38 | Other Health Impairment (L) | | None | |
| 39 | Specific Learning Disability (D) | | None | |
| 40 | Specific Learning Disability (D) | Speech and/or Language Impairment (I) | Speech/Language | |
| 41 | Developmental Delay (N) | | None | |
| 42 | Specific Learning Disability (D) | Speech and/or Language Impairment (I) | Speech/Language | |
| 43 | Speech and/or Language Impairment (I) | | None | |
| 44 | Other Health Impairment (L) | | None | |
| 45 | Specific Learning Disability (D) | Speech and/or Language Impairment (I) | None | |

| | Primary Disability | Secondary Disability | Related Service(s) | Dismissed from Services 2020-2021 |
|---|---|---|---|---|
| 46 | Speech and/or Language Impairment (I) | | Social Work | |
| 47 | Specific Learning Disability (D) | Speech and/or Language Impairment (I) | Occupational Therapy, Speech/Language | |
| 48 | Other Health Impairment (L) | | Occupational Therapy | |
| 49 | Specific Learning Disability (D) | | Speech/Language, Occupational Therapy | |
| 50 | Orthopedic Impairment (C) | | Occupational Therapy, Physical Therapy | |
| 51 | Emotional Disability (K) | | Social Work, Occupational Therapy | |
| 52 | Speech and/or Language Impairment (I) | | None | x |
| 53 | Hearing Impairment (F) | Specific Learning Disability (D) | Audiology, Hearing Itinerant | |
| 54 | Other Health Impairment (L) | | Social Work | |
| 55 | Hearing Impairment (F) | Specific Learning Disability (D) | Audiology, Hearing Itinerant, Social Work | |
| 56 | Other Health Impairment (L) | | Social Work | |
| 57 | Emotional Disability (K) | | None | |
| 58 | Specific Learning Disability (D) | | None | |
| 59 | Other Health Impairment (L) | | Physical Therapy, Occupational Therapy, Physical Therapy | |
| 60 | Specific Learning Disability (D) | | None | |
| 61 | 504 | | | |
| 62 | 504 | | | |
| 63 | 504 | | | |
| 64 | 504 | | | |
| 65 | 504 | | | |
| 66 | 504 | | | |
| 67 | 504 | | | |
| 68 | 504 | | | |
| 69 | 504 | | | x |
| 70 | 504 | | | |
| 71 | 504 | | | |
| 72 | 504 | | | |
| 73 | 504 | | | |

|    | Primary Disability | Secondary Disability | Related Service(s) | Dismissed from Services 2020-2021 |
|----|--------------------|----------------------|--------------------|-----------------------------------|
| 74 | 504 |  |  |  |
| 75 | 504 |  |  |  |
| 76 | 504 |  |  |  |
| 77 | 504 |  |  |  |
| 78 | 504 |  |  |  |
| 79 | 504 |  |  |  |
| 80 | 504 |  |  |  |
| 81 | 504 |  |  |  |
| 82 | 504 |  |  |  |
| 83 | 504 |  |  | x |
| 84 | 504 |  |  |  |
| 85 | 504 |  |  |  |
| 86 | 504 |  |  |  |
| 87 | 504 |  |  |  |
| 88 | 504 |  |  |  |
| 89 | 504 |  |  |  |
| 90 | 504 |  |  |  |

# Section D: Personnel Credentials

**SECTION D:**

| Legal Last Name | Legal First Name | Position | Degree | Certification | Years Teaching |
|---|---|---|---|---|---|
| Alvarado | Jesus | Custodian | | No | |
| Anderson | Emily | Instructional Assistant | Bachelors | No | |
| Anderson | Jacqueline | Instructional Assistant | Bachelors | Sub/ParaPro | |
| Barnett | Katherine | Teacher 1st Gr. | Masters | Yes | 17 |
| Batz | William | Maintenance Supervisor | Bachelors | No | |
| Blietz | David | Instructional Assistant | Bachelors | Substitute | |
| Bonicontro | Allison | Instructional Assistant | Masters | Yes | |
| Bredican | Deborah | Bookkeeper | Associates | No | |
| Breum | Janet | School Secretary | Bachelors | Sub | |
| Byrd | Elizabeth | Instructional Assistant/Enrich Me | Bachelors | ParaPro | |
| Coonan | James | Teck Support | Bachelors | No | |
| Coyle | Shanna | School Nurse | Bachelors | Nurse | |
| Deigan | Geoff | Executive Director | Bachelors | No | |
| Dietzel Hershiser | Naomi | Dean of Envir. Curric. | Masters | Yes | 8 |
| Disalvo | Kimberly | Business Manager | Associates | No | |
| Fiorelli | Kyle | Sp. Ed. Teacher | Masters | Yes | 5 |
| Flinn | Joshua | PE Teacher/Title 1 Reading Spe. | Bachelors | Yes | 2.75 |
| Flood | Joshua | Teacher 7th/8th Gr Social Studies | Masters | Yes | 9 |
| Franzen | Audrey | Instructional Assistant | Bachelors | No | |
| Freeman | Robert | Teacher EL | Bachelors | Yes | 6.25 |
| Geoghan | Rebecca | Instructional Assistant | Bachelors | Yes | |
| Gernady | Anne | School Psychologist | Masters | Yes | |
| Hahn | Lynn | Teacher 3rd Grade | Bachelors | Yes | 21 |
| Hansis | Laura | Instructional Assistant | Bachelors | ParaPro | |
| Hershiser | Michael | Teacher 7th/8th Grade Math | Masters | No | 17 |
| Hodapp | Christine | Capacity Builder | Diploma | No | |
| Hodapp | Jack | Garden/Grounds Care | Diploma | No | |
| Huska | Melinda | Sp. Ed. Teacher | Masters | Yes | 9 |
| Jackson | Heather | Teacher 7th/8th Grade Science | Bachelors | Yes | 8 |
| Jeffery | Christine | Teacher 2nd Grade | Bachelors | Yes | 18 |
| Jensen | Elle | Instructional Assistant | Bachelors | Yes | |
| Johnson | Patricia | Reading Teacher | Bachelors | Yes | 15 |
| King | Megan | Instructional Assistant | Bachelors | Yes | |
| Kirby | Abigail | Instructional Assistant | Bachelors | Substitute | |
| Klug | Rachel | Teacher/Music | Bachelors | Yes | 4 |
| Krueger | Lindsey | One-on-One Teacher Assist. | Bachelors | ParaPro | |
| Larson | September | Teacher 3rd Grade | Masters | Yes | 9 |
| Leve-McClevey | Wendy | One-on-One Teacher Assist. | Bachelors | Substitute | |
| Loustaunau | Christopher | P. E. Teacher | Masters | Yes | 5 |
| Loustaunau | Jessica | Dir. of Spec. Ed | Masters | Yes | 6 |
| Martinez | Ashley | Sp. Ed. Teacher | Masters | Yes | 9 |
| McGeever | Jana | Teacher 5th-8th Spanish | Bachelors | Yes | 11 |
| McKee | Marjorie | Teacher Kindergarten | Masters | Yes | 7.45 |
| McNally | Sydney | Teacher 4th Grade | Bachelors | Yes | 3 |

| Legal Last Name | Legal First Name | Position | Degree | Certification | Years Teaching |
|---|---|---|---|---|---|
| Meyer | Caryn | Social Worker | Masters | Yes | 22 |
| Moriello | Nicholas | Custodian | Diploma | No | |
| Mudge | Lisa | Instructional Assistant | Bachelors | No | |
| Mui | Katherine | Teacher 2nd Grade | Bachelors | Yes | 3 |
| Neil | Susan | Teacher 5th Grade | Bachelors | Yes | 5 |
| Ottaviani | Megan | Teacher 4th Grade | Bachelors | Sub/ParaPro | 2 |
| Parker | Julianna | Teacher Kindergarten | Masters | Yes | 7.60 |
| Plucinski | Melissa | Sp. Ed. Teacher | Masters | Yes | 11 |
| Pondelik | Elizabeth | Sp. Ed. Teacher | Bachelors | Yes | 2 |
| Psimaras | Laura | Teacher 5th Grade | Masters | Yes | 10 |
| Recker | Susan | Instructional Assistant | Bachelors | Substitute | |
| Reeder | Brandon | Garden/Grounds Care | Diploma | No | |
| Reidy | Nancy | One-on-One Teacher Assist. | Masters | Yes | |
| Roman-Ahlgrim | Lisette | Teacher Kdg – 4th Spanish | Bachelors | No | 4.75 |
| Scott | Adam | Instructional Assistant | Bachelors | ParaPro | |
| Shin | Kyung-Ihn | Teacher/Accelerated Math | Bachelors | Yes | 1.64 |
| Siegel | Forrest | One-on-One Teacher Assist. | Diploma | ParaPro | |
| Siegel | Janette | Executive Admin. Assist. | Diploma | No | |
| Siegel | Quentin | Instructional Assistant | Diploma | No | |
| Smetters | Felicia | Teacher 1st Grade | Bachelors | Yes | 2 |
| Spencer | Kaela | One-on-One Teacher Assist. | Bachelors | ParaPro | |
| Steinbeck | Tammy | Instructional Assistant | Masters | Substitute | |
| Stewart | Sarah | Teacher 7th & 8th Grade LA | Masters | Yes | 6.50 |
| Stewart | Scott | Instructional Assistant | Associates | ParaPro | |
| Thomas | Andrew | Teacher Art | Bachelors | Yes/ Sub | 7 |
| Tomei | Susan | One-on-One Teacher Assist. | Bachelors | Sub/ParaPro | |
| Trage | Helen | Instructional Assistant | Bachelors | Substitute | |
| Turner | Roxanne | Teacher 6th Grade | Bachelors | Yes | 6 |
| Venegoni | Danielle | Culture Coach | Masters | Yes | 6 |
| Verenski | Frances | Administrative Assistant | Masters | Substitute | |
| Wadleigh | Bonniesue | One-on-One Teacher Assist. | Bachelors | Yes | |
| Weber | Julia | Instructional Assistant | Bachelors | Substitute | |
| Wright | Theresa | Teacher 6th Grade | Bachelors | Yes | 1 |
| Zamiar | Robert | Dean | Masters | Yes | 19 |
| Zaragoza | Peter | One-on-One Teacher Assist. | Diploma | ParaPro | |
| Zimmerman | Kristen | Instructional Assistant | Bachelors | Substitute | |
| **Contactors** Legal Last Name | Legal First Name | Position | Degree | Certification | Years Teaching |
| Caruth | Laura | Speech Pathologist | Masters | Yes | |
| Jacobs | Jim | Band Instructor | Bachelors | No | |
| Kruse | Norma | Hearing Itinerant | Masters | Yes | |
| Vanderbilt | Katie | Occupational therapist | Bachelors | Yes | |
| Clifton | Sherry | Physical Therapist | Masters | Yes | |
| Johnson | Renee | Physical Therapist | Masters | Yes | |

# Section E: Best Instructional Practices

Kindergarten Unit of Study 2020 - 2021

Unit of Study:  Change Over Time - Animal Adaptations

Note: Unit is in the format of presentation slides due to teaching remotely to students on Zoom.

# Day One: Introduction to seasons changing

Many of you have already started to notice that the season is changing.

Summer has ended.
What season comes after summer?

It's Fall!

15 PNG FILES + EPS

**GOODBYE SUMMER, HELLO AUTUMN**

KENARD PAK

Let's read about what happens when summer ends and autumn begins.

click
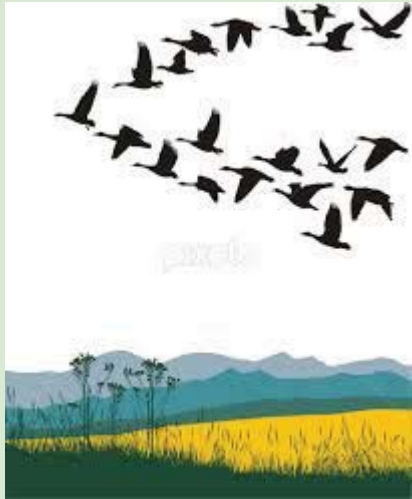
Migration



Camouflage



Gathering



Leaves changing color and falling off the trees

What are some things you like
to do in the fall?

Draw a picture of your favorite
autumn activity.

Day two: Just like people adapt to the season changes, other animals adapt to their environment too.

# Animals adapt to their environment

Last week we learned about how our environment is changing from the warm season of summer, to the chilly season of fall. After fall comes winter. The animals that live in climates that change from warm to cold, need to prepare for the cold weather or they will die. They do this preparation in the season of fall.

Here are the ways that animals prepare for winter:
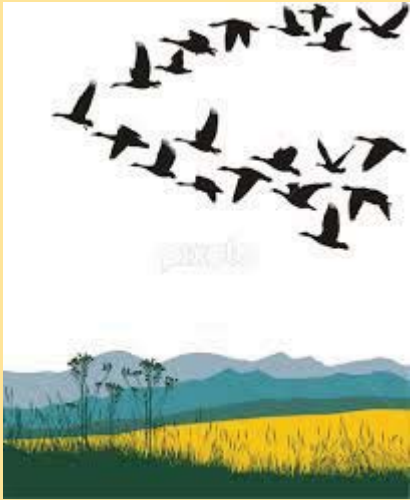
# Migration:

Animals leave the chilly weather and find warm weather (some birds and some butterflies).

# Hibernation:

animals eat a lot and then go into a deep sleep (bats, most bees, woodchucks, bears)

# Caching:

Animals collect food in the fall to have as a supply in winter (squirrels, chipmunks)

# **Hunting:**

Animals stay and hunt for their food all winter long (mice, deer, rabbit, fox, coyote)

Here is a book called, Animals in Winter. It tells us  how animals prepare for the winter.  Think about the different animals and ways that they get adapt to the environment. Listen for the words, migrate, hibernate, cache, and hunt.

https://youtu.be/eLDbjt_FiTM

Day 3: People are animals too; adaptations people make

Today we are going to talk about migration some more.
Migration is when an animal leaves their home in search of a warmer home for the winter.
Then they come back in spring.
Some animals that migrate in our area are ducks, geese, and monarch butterflies.

Why do these animals leave? Why can't they just stay here? (their habitat of water is frozen, they don't have fur, their food source is gone) Some people like to migrate in the winter too!

Let's pretend to be animals that migrate. Who can think of an animal that migrates? (move around the room as that animal. Do a couple times).

Did you know that people are animals too?  What do people do
to prepare for the winter?
(spend more time indoors, wear warm clothing,)

Now it's your turn to draw a picture. Do you prefer warm
weather or cold weather? Draw a picture of you doing your
favorite thing in either warm or cold weather.

Day 4: Real life observations of nature changes and animal adaptations

Get out your Nature Scavenger Hunt. We are going to look for signs of the season changing from fall to winter.
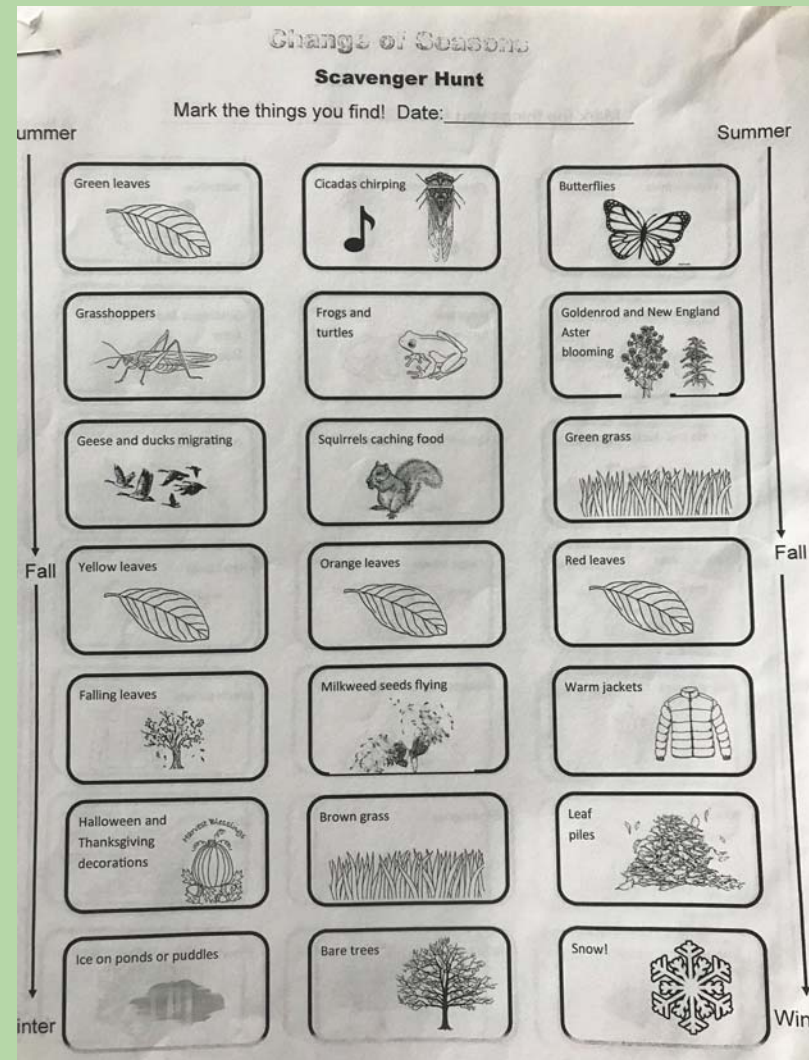
Day 5 and 6: Dig deeper and wrap up

We have been talking about different animals and how they survive when there are changes in their environment.

Now we are going to learn about spiders and what happens to them when their environment changes.
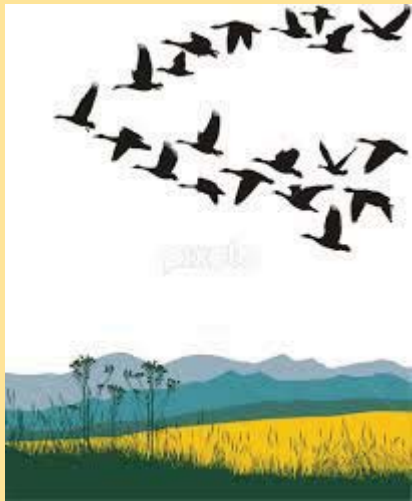
For example, some animals **migrate**, they leave the chilly weather and find warm weather (some birds and some butterflies).

Other animals, like bears, bats, frogs, bees, and earthworms, **hibernate,** or go into a deep sleep.

Some animals **cache** food, which means they store up food to eat in the cold weather. In our area, squirrels and chipmunks are the most common animals in our area that cache.

We also learned about **reptiles and amphibians,** and how they have different adaptations to help them survive changes in their environment. For example, reptiles have scales all over their bodies to protect them and amphibians are able to breathe both water and air.



I'm a reptile!



I'm an amphibian!!

Now we are going to learn about **spiders** and what happens to them when their environment changes.

There are many thousands of species of spiders. Some of them hibernate, or go into a deep sleep, in the winter, and other species die off when the weather gets cold. But the spiders that die will make sure to either produce egg sacs that will hatch baby spiders in the spring, or they will hatch their babies in the fall and the babies will stay entrenched in their egg sacs until spring.
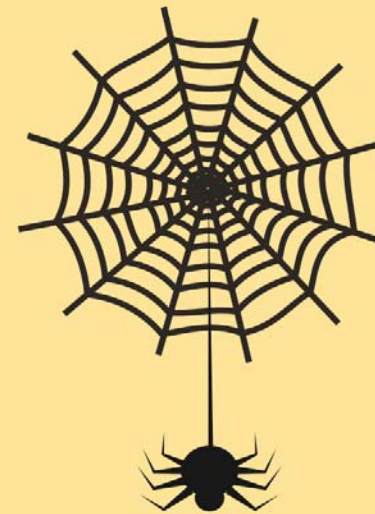
Here are a couple of different types of spiders.
Spiders are not insects because they have 8 legs instead of 6 like insects. Spiders are animals in the class of arachnids(along with ticks and scorpions). Notice the different colors and sizes of these spiders!

Let's learn some more about spiders: (look at some pages and summarize main points)

National Geographic Book Spiders on EPIC( classroom code upk0498)

Here's a fictional book about Spiders: (The Very Hungry Spider, Eric Carle)
https://www.youtube.com/watch?v=TfL0g-XRxnA

Now let's watch part of a video showing how spiders spin their web (the first 1:30 is enough):

Watch a spider spin a web.

Now it's your turn!
Can you draw a picture of a spider? Will it be a big one or a small one? Will it look furry or smooth, colorful, or black? I am excited to see what kind of a spider that you draw! Make sure to give the spider a web to rest in.
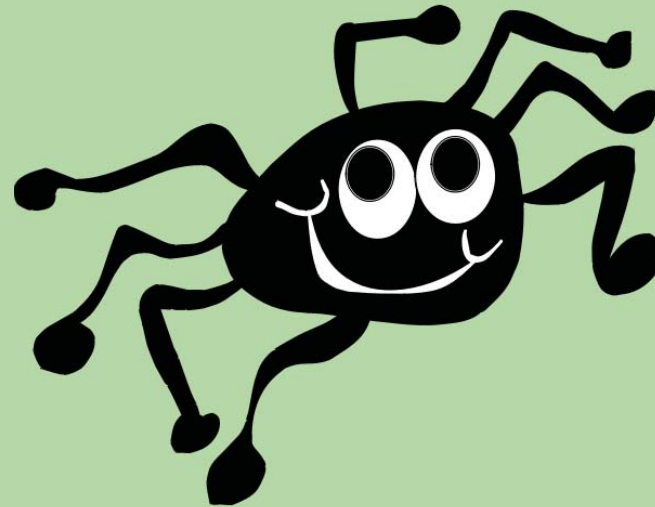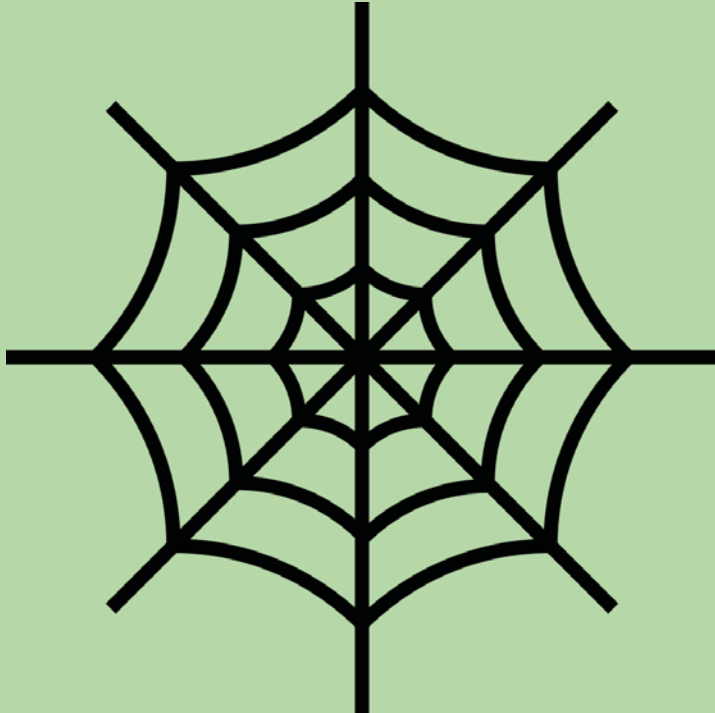
# 1st/2nd Grade Light and Sound Unit of Study

| January | | | | |
|---|---|---|---|---|
| Monday | Tuesday | Wednesday | Thursday | Friday |
| 4<br>INTRO LESSON | 5 | 6<br>SOUND LESSON 1 | 7 | 8 |
| 11<br>SOUND LESSON 2 | 12 | 13<br>SOUND LESSON 3 | 14 **MATERIALS PICK UP** | 15 - **ER** |
| 18 - **NO SCHOOL: TI** | 19<br>SOUND LESSON 4 | 20 | 21<br>SOUND LESSON 5 | 22 |
| 25<br>SOUND LESSON 6 | 26 | 27<br>LIGHT LESSON 1 | 28 | 29 **MATERIALS PICK UP** |

| February | | | | |
|---|---|---|---|---|
| Monday | Tuesday | Wednesday | Thursday | Friday |
| 1<br>LIGHT LESSON 2 | 2 | 3<br>LIGHT LESSON 3 | 4 | 5 |
| 8<br>LIGHT LESSON 4 | 9 | 10<br>LIGHT LESSON 5 | 11 - **ER** | 12 - **NO SCHOOL: TI** |
| 15 - **NO SCHOOL** | 16<br>LIGHT LESSON 6 | 17 | 18<br>COMMUNICATION LESSON 1 | 19 **MATERIALS PICK UP** |
| 22<br>COMMUNICATION LESSON 2 | 23 | 24 | 25 | 26 - **ER**<br><br>**End of Unit 2** |

**Unit Notes:**
- [LINK TO UNIT](#)
- 15 lessons
- Add in Naomi lesson/activity
  - Connection to Moon/Sun
  - Connection to animals: bats/hearing
-

**Lessons Notes:**

Intro Lesson: [What is a Scientist? By Barbara Lehn (youtube)](#)

**Lessons on Sound:**

Lesson 1: [Look, Listen, Taste, and Smell by Pamela Nettleton (youtube)](#)

"Going' on A Sound Hunt" Mini Book
- Walk around house (remote), around back yard

Lesson 2: http://lucky2be1st.com/youtubesound
- 2 Craft Sticks per student
- 2 - 1.5" straw pieces
- 1 large rubber band per student
- 2 thin rubber bands per student
- Make sure to have a kazoo made to show students what it should look like

Ms. Naomi Lesson (Environmental Educator):
- Birds of Winter
- Bird Calls - local birds
- Identify birds calls

Lesson 3: What are Sound Waves by Robin Johnson (Epic!)
http://lucky2be1st.com/sidsciencekid
- 1 plastic ruler for each student
- "Good Vibrations" recording sheet

Lesson 4: Sounds All Around by Wendy Pfeffer (youtube)
http://lucky2be1st.com/highandlowsounds
- 1 tissue box, tin or shoebox for each student
- Various sized rubber bands
- "Makin' Music" sheet
- "Play That Funky Music" Mini book

Ms. Naomi Lesson (Environmental Educator):
- Echolocation
- What animals use echolocation
- How does it work?
- Biomimicry

Lesson 5:
http://lucky2be1st.com/garthsoundwaves
- 1 wire hanger per child
- 1 metal spoon per child
- 2 - 2 feet lengths of string per child
- "Sound on the Move" mini book
- Send home the hanger with string already attached. Ask parents to give student metal spoon

Lesson 6: http://lucky2be1st.com/soundmattersvideo
- Supplies needed for the TEACHER: plastic cups, plastic wrap, rubber bands, water, tuning forks, bubbles, salt (crystals, if possible), sugar, rice
- "Sound Matters" Flip book
- Send home bubbles
- Have the other centers set up to complete in the classroom - teacher demo

- Students can do the bubble center at home

Ms. Naomi Lesson (Environmental Educator)
- [Animal Hearing](#)

**Lessons on Light:**

Lesson 1:

        [http://lucky2be1st.com/sounddr](http://lucky2be1st.com/sounddr)
- 1 toilet paper tube per student
- Hole punch (to punch tubes……..)
- 2" x 2" square of black construction paper per student
- Glue
- Flashlight
- Stickers
- "Do You See What I See?" mini book

Replace Lesson 1:
- Send home an envelope with a purple sun, blue heart, and a piece of crayon
- Have them go into a dark closet or bathroom, presumably there will be a tiny bit of light coming in under the door so they'll be able to see just a little bit. Tell them they'll need to spend a few minutes getting used to being in the dark.

- Then open the envelope. There will be a crayon in the envelope, and pictures of a heart etc. Their job is to write down what color each of these things is (on the answer sheet, if you include that in there as well).

- If you want to do the eye patch experiment too, they'll also need a flashlight or something. Have them close one eye and cover one it with their hand. Keep it covered. Then turn on the flashlight -- only 1 eye will be exposed to the light. After a short while (a minute, 30 seconds even), have them turn off the light. Then, they can uncover their other eye and compare the 2 -- 1 will be adjusted for dark and the other for light and they can see the difference.

- You might need to do that in a separate visit to the closet, as it could be a lot to remember both instructions. They can't take their computers in there -- that's a light source and will ruin the experiments.

- This is all explained by the fact that we have cones (for color vision, need light) and rods (for seeing with much less light, but can't see color).

Lesson 2:
- "Let Me See Light" anchor chart page
- "Is It Real or Artificial?" PPT
- "Is It Real or Artificial?" recording sheet

Lesson 3: [What are Light Waves? By Robin Johnson (Epic!)](#)
- Transparent, Translucent & Opaque vocab posters (in student journal)
- Transparent objects (clear cup, glass, water bottle, etc)
- Translucent objects (wax paper, sunglasses, paper, etc)

- Opaque objects (plastic or paper cups, foil, etc.)
- Flashlight for each student
- "Let There Be Light" recording sheet
- Solo cups - clear cups, colored cup, and tinted cup

Lesson 4:

- 1 clear 18 oz. solo cup per student
- Water
- Tape
- "Magical Emojis" (in student journal)
- Small paper for students to create their own images
- "Eye Tricks" recording sheet

Lesson 5:

http://lucky2be1st.com/reflectionvideo
- Mirrors
- Compact mirrors (two sided with hinges)
- Markers
- Flashlights
- Small objects (LEGO men, crayons, etc)
- Recording Sheets: Reflective Shapes, Reflective Writing, Reflective Objects, Reflective Targets

Lesson 6:

Oscar and the Moth
http://lucky2be1st.com/shortshadowvideo
- Building blocks, small toys, etc.
- Sunlight
- Black marker
- "Seeing Shapes" response sheet

**Lessons on Communication:**

Lesson 1: Sending Messages Using Light and Sound by Jennifer Boothroyd (Epic!)
http://lucky2be1st.com/telphonecups
- 2 paper cups per student
- 20 feet of string per student
- 2 paper clips per student
- "Can You Hear Me Now?" recording sheet

Ms. Naomi Lesson (Environmental Educator)
- Animal Communication

Lesson 2:

- Misc. supplies: blocks, dominoes, rulers, small toys, mirrors, paper towel/toilet paper rolls, duct tape, packing tape, scotch tape, rice, glue, rubber bands, string, cardboard, crayons and markers, lasers, flashlights, water bottles - get creative!
- "What's That You Say?" recording sheet

# 3rd/4th Grade Band Unit of Study

**Unit of Study: Inherited Traits and Adaptations**
In this unit students will learn about various traits that describe living things, both how they look and how they behave. Both physical traits and behaviors help organisms to survive. While some traits are inherited, others must be learned. Inherited traits are those traits that are passed to the offspring from their parents. They include physical traits such as hair/fur color, skin color, leaf shape, and beak shape, but they can also include animal behaviors known as instincts or instinctive behaviors, such as hibernating, migrating, web building, nest building and playing dead when threatened. Learned traits are behaviors that animals must be taught. They are learned after birth and result from what the animal experiences during life.

**Grade Level:** 3rd and 4th grade

**Time Frame:** 12-13 Days

**Essential Questions:**
How are traits inherited?
How do inherited traits help animals and plants survive?
How are inherited traits different from learned behaviors?

**Illinois Social Science Standards:** LS2.C: Ecosystem Dynamics, Functioning, and Resilience  When the environment changes in ways that affect a place's physical characteristics, temperature, or availability of resources, some organisms survive and reproduce, others move to new locations, yet others move into the transformed environment, and some die. (secondary to 3-LS4-4) LS4.A: Evidence of Common Ancestry and Diversity  Some kinds of plants and animals that once lived on Earth are no longer found anywhere. (Note: moved from K-2) (3-LS4-1) Fossils provide evidence about the types of organisms that lived long ago and also about the nature of their environments. (3-LS4-1) LS4.B: Natural Selection  Sometimes the differences in characteristics between individuals of the same species provide advantages in surviving, finding mates, and reproducing. (3-LS4-2) LS4.C: Adaptation  For any particular environment, some kinds of organisms survive well, some survive less well, and some cannot survive at all. (3-LS4-3) LS4.D: Biodiversity and Humans  Populations live in a variety of habitats, and change in those habitats affects the organisms living there. (3-LS4-4)

**Knowledge and Skills:**
Students know that organisms resemble their parents and have structures and processes that help them survive. They can identify and sort plants and animals by physical characteristics and they have observed the changes that are a part of the life cycle of plants and animals. They have learned how physical characteristics and behaviors, known as adaptations, help animals and plants meet their basic needs and survive in their environment. They have also learned that some characteristics of organisms are inherited and some are learned in response to their environment. They can compare the life cycles of plants, animals and insects.

Day 1=
1. Comparing Apples- http://as210.http.sasm3.net/Lessonplan/preview.cgi?LPid=2710
   Talk more about seed of apple makes an apple like the apple it came from.
   Ok to use tomato or orange
   a. Compare popcorn to Indian Corn during this day's lesson. Students can tell you similarities and differences.

   **Living Corn Necklace- http://www.uen.org/Lessonplan/preview.cgi?LPid=2711
   Integrate this lesson with #1 above. This lesson requires that the corn sprout.

Day 2=
2. Slide show of animal adaptations made by Naomi discuss animals from different regions, Read Penduli, Students create an animal like deer and students draw it for a cold climate and desert (hot) climate

Day(s) 3 +4 =
3. Snowshoe Hare/Cottontail Rabbit http://www.uen.org/Lessonplan/preview.cgi?LPid=28334
         Book How do Animals Adapt by Bobbie Kalman
Cards children sort into categories/groups with no guidance- ask each group why, can you sort into a different groups?
( This might take 2 days)
● Add on a camouflage coloring bunny activity in classroom- kids color a rabbit outline to match a spot in the classroom and then hide theirs. Bunny shape link
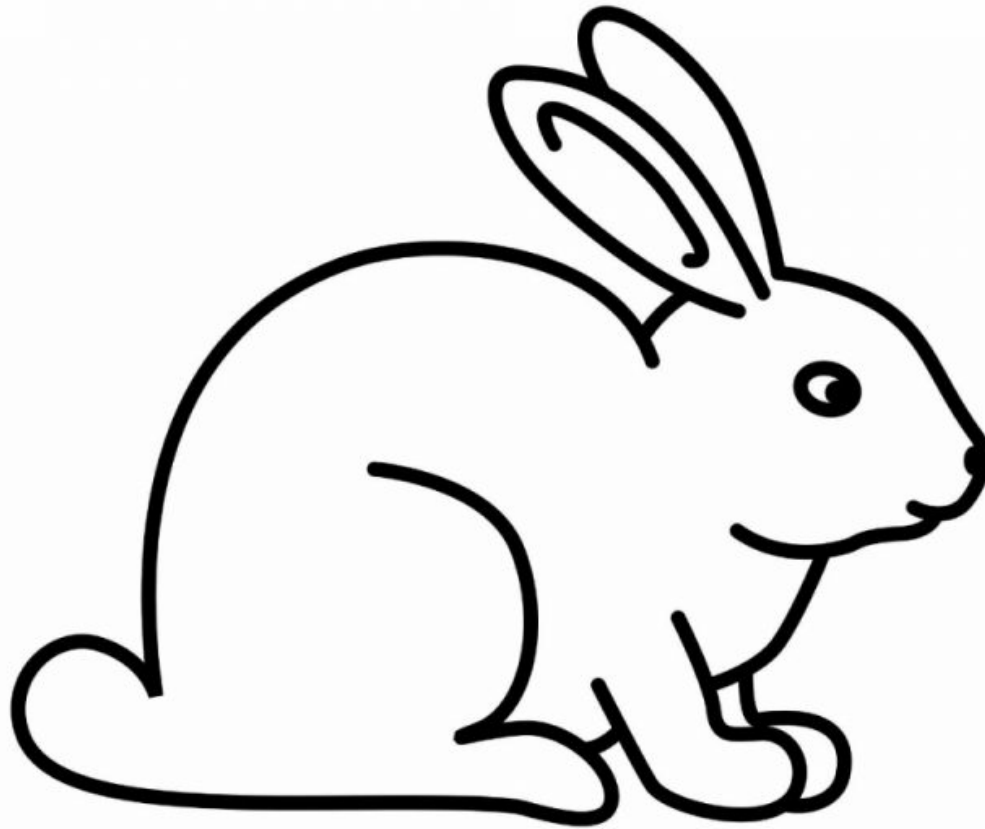
Day 5=
4. Bird Beak Lesson - Naomi can create, if needed you can use the backpack lesson in the EE library.

Day 6/7=
5. Learned VS Inherited Traits - http://www.uen.org/Lessonplan/preview.cgi?LPid=33034
    Book Sisters and Brother by Steve Jenkins and Robin Page

Book Pinduli and Stellaluna

**Animal Adaptations Interactive**

Day 8/9:
Review what an adaptation is (a heritable trait -- body part or behavior -- that helps an organism survive in its specific environment).
    Discuss/chart what plants and animals need to be adapted for:

| animals | plants |
| --- | --- |
| Climate (examples -- winter weather, | Climate (examples -- winter weather, |

| heat, dryness, windy conditions, salty conditions near ocean, fire, etc.) | heat, dryness, windy conditions, salty conditions near ocean, fire, etc.) |
|---|---|
| Finding/obtaining food and water | Getting sunlight and water |
| Escaping predators/protection/defense | Protection from being eaten |
| Reproduction (attracting mates, raising and protecting young) | Reproduction (pollination, seed dispersal, etc.) |

Observe similarities and differences

Since most of the examples the class has used are animals, explain that you'll be looking at plants... start with the same extreme examples you did with the hares and foxes -- deserts and arctic environments. Look at one plant that is adapted to each:

| Adaptation | Saguaro CACTUS example | SPRUCE TREE example |
|---|---|---|
| climate | Modified leaves (thorns) are very thin and don't allow for water to evaporate from them. Cactus has waxy coating to stop water from evaporating. | Branches bend downward to shed snow; wood is flexible so they don't break with the weight. Needles have waxy coating to protect from cold and keep water |
| sun | Not a huge issue! Without green leaves, the cactus' entire surface is green and photosynthesises. | Green year-round |
| water | Long taproot to get access, whole thing is spongy to store water and swells up with rain to hold as much water as it can for as long as it can | Waxy needles prevent evaporation Netted root system (no taproot) for poor soil conditions |
| protection | Spines, ability to scar when burrowed into | Spiky leaves, acidic taste Thick bark protects trunk |
| reproduction | Night-time pollination by bats, birds and insects; flower only open April to June; each fruit contains thousands of seeds and only a few make it! | Cones are male and female (females are larger) and are wind-pollinated |

Use pictures of other plants with interesting adaptations to do a matching game... Have cards show the plant part, and another card that describes how it's helpful; hand out to kids, have them find their partner, then share/discuss with class (**Print Out the Descriptions in Larger Font Below)**

| Picture of... (pictures below) | Matches with... |
|---|---|

| | |
|---|---|
| Fuzzy leaves | Who wants to eat something furry? These leaves keep insects from eating them. |
| Lily pads (large surface area) | The large surface of these leaves allow them to float on top of the water and get a lot of sunlight. |
| Vining plant | Getting sun isn't a problem if you can climb up your taller neighbors! |
| Bluestem roots | Dry soil? Not a problem if your roots go WAY down into the dirt. |
| bright/patterned petals | These bright colors attract pollinators to come eat nectar and transfer pollen so the plants can make seeds. |
| Milkweed seeds | These parachutes help seeds disperse to new locations. |
| Bur oak trunk | This thick bark protects the tree from prairie fires that would kill another tree. |
| Buttress roots | These roots help stabilize the plant in areas with thin soil |
| Nightshade | This plant is poisonous -- eat at your own peril! |
| Huge leaves of a rainforest plant | These leaves are big to soak in all the sunlight available even though they grow in the shade of taller trees. |
| Venus flytrap | This plant has learned to get some nutrients from eating animals! |
| Spanish moss | This plant gets all its nutrients from the air and water -- no roots needed! |

Take a plant adaptation walk (outside) -- look at some key plants on campus and discuss adaptations to each of the above categories of adaptation: bur oak, cattail, indian grass or big bluestem...

    a. Bur oak -- thick bark to protect from fire; heavy acorns to fall to the ground; spreading branches to get sun, extensive lateral roots stabilize it for high winds; deep taproot to get water (5 feet in the first year of growth!);

Wrap up -- have each student share one thing they learned today with a partner.

Day 10:

Here are 2 plant adaptation sheets for use outside.  Plant adaptations 1.  Plant adaptations 2.

**Physical and Behavioral Adaptations Plant Adaptations Presentation**

1.  Review what an adaptation is (a heritable trait -- body part or behavior -- that helps an organism survive in its specific environment).
2.  Have kids list animal adaptations they can think of. Write.  (Most if not all will be physical adaptations.) -- possibly have each kid write 1 on a post-it note and have a few share.
3.  Go back to the definition.  Underline body part and behavior.  Tell students that today you'll be looking into this part of the definition.  Intro terms physical and behavioral adaptation.  Discuss meaning if needed.  Look at the adaptations that they came up with. Categorize.  Most will be physical.
4.  See if kids can generate some ideas for behavioral adaptations -- things that animals do to survive. Remember that adaptations are heritable traits, so we're talking about instinctual behaviors, not things that an animal might luck into to survive. EXAMPLES: flocking/herding behavior, puffing up to look bigger and scare predators, migrating, snuggling together in a den, hive or home to stay warm, waggle dancing (bees), "freezing" to avoid being seen, imprinting on mamas, turtles basking in the sun, laying eggs in another bird's nest, hiding food caches for the winter...
5.  Give each group a native animal -- squirrel, chickadee, owl, deer, garter snake, bat, etc. Have them see how many adaptations they can come up for for that animal and then sort them into behavioral and physical adaptations.  Share.

Special note: plants do have behavioral adaptations -- like phototropism -- but they're not as accessible so we're doing this one with animals.

Day 11/12:

**Create-a-Critter**

You already used this concept with arctic/desert voles, but this will take it one step further.  It can also be used as follow-up to either of the previous lesson -- by creating a plant instead of or in addition to a critter, or by requiring that some of the adaptations be behavioral (and described in words).

Have students choose climate condition cards.  They must develop a critter that is adapted to deal with those conditions.  Remind them that their critter needs to be able to get enough food/water, protect itself, etc.  You can determine the extent to which this is visual, written, or a combination; and how in depth the final product is.

Conditions:

| temperature | precipitation | weather | geology | Plant life (if developing an animal) |
|---|---|---|---|---|
| Very hot | A lot of precipitation (rain in heat, snow in cold), humidity | windy | Rocky area | Lives in and among trees/forest |
| Very cold | Very dry; little precipitation | Calm (not windy) | Deep, rich soil | Lives in/among grasses and flowers (prairie) |
| Variable seasons, hot summers and cold winters | Variable -- a dry season for 6 months and and a wet season for 6 months | sunny | Steep hillside | Lives in area with little plant life |
| Temperate year-round | Variable with average amounts of precipitation throughout the year. | shady | Very wet soil most of the year | |
| | | | Very dry, sandy soil most of the year | |

**Other ideas we could develop:**
- Co-adaptation
- nature/nurture (ideas like height is an inherited trait, but your environment will affect how it plays out -- poor nutrition or being contained in a box and you won't grow as tall; skin color is inherited but twins born with the same skin color and one grows up in the hot sun and one covered in coats in the cold north, and their pigment will look different (on the other hand, maybe we don't touch that one)...
- Comparison of defense adaptations (sprays, poisons, quills, coloration, spines, etc)
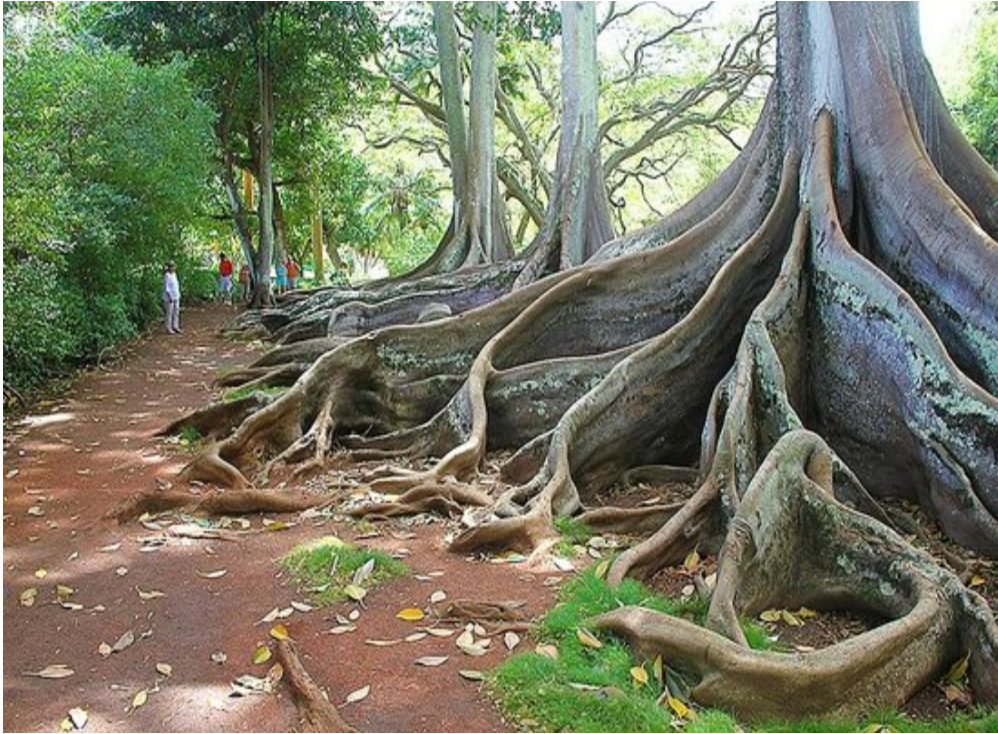
| |
|---|
| Who wants to eat something furry?  These leaves keep insects from eating them. |
| The large surface of these leaves allow them to float on top of the water and get a lot of sunlight. |
| Getting sun isn't a problem if you can climb up your taller neighbors! |
| Dry soil? Not a problem if your roots go WAY down into the dirt. |
| These bright colors attract pollinators to come eat nectar and transfer pollen so the plants can make seeds. |
| These parachutes help seeds disperse to new locations. |
| This thick bark protects the tree from prairie fires that would kill another tree. |
| These roots help stabilize the plant in areas with thin soil |
| This plant is poisonous -- eat at your own peril! |
| These leaves are big to soak in all the sunlight available even though they grow in the shade of taller trees. |
| This plant has learned to get some nutrients from eating animals! |
| This plant gets all its nutrients from the air and water -- no roots needed! |

# Research Project- Biome Unit Overview

**Unit Title:**  Research Project - Biome Unit

**Grade level:**  5th                    **Time Frame:** 15 days

**Essential Questions:**

- How does flora, fauna, and climate interact to create and define a specific biome?
- How does our knowledge of the world around us create a human connection to a specific place?

**Knowledge and skills:**

Students will be able to…

- Read informational text to understand details and summarize the main idea
- Draw inferences from the the text they read
- Use mapping skills to understand the location of different biomes across the globe
- Use relevant sources to expand their knowledge of a specific biome
- Take notes as they read to develop a greater understanding of the flora, fauna, and climate of a specific biome
- Make connections between the characteristics of a biome and how these characteristics affect and support the ecosystem of a specific biome
- Investigate plant and animal adaptations that are critical to the survival of the species
- Demonstrate an understanding of the factors that affect climate
- Present information using a variety of methods including Google slides, written report, diorama, poster, trifold poster
- Use effective presentation methods to convey the information to the class in a manner that is concise, audible, and demonstrates a solid understanding of material

**Essential Vocabulary:**
Biome
Abiotic
Biotic
Terrestrial
Aquatic
Flora
Fauna
Climate
Tropical Rainforest
Deciduous Forest
Taiga
Tundra

Savannah/Grasslands
Desert
Adaptations: Learned/Instinctive
-Physical/Behavioral
Camouflage
Hibernation
Migration

## Illinois Standards (Science):
NGSSMS-LS2-1
Analyze and interpret information to provide evidence for the effects of resource availability on organisms and populations or organism in an ecosystem. Emphasis is on cause and effect relationships between resources and growth of individual organisms and the numbers of organisms in ecosystems during periods of abundant and scarce resources.

## Illinois Standards (Social Studies):
SS.G.4.5: Compare the environmental characteristics of the United States to other world regions.

## Illinois Standards (ELA):
CC.5.W.7 Research to Build and Present Knowledge: Conduct short research projects that use several sources to build knowledge through investigation of different aspects of a topic.
CC.5.R.I.9 Integration of Knowledge and Ideas: Integrate information from several texts on the same topic in order to write or speak about the subject knowledgeably.
CC.5.W.2 Text Types and Purposes: Write informative/explanatory texts to examine a topic and convey ideas and information clearly.
CC.5.W.2.b Text Types and Purposes: Develop the topic with facts, definitions, concrete details, quotations, or other information and examples related to the topic.
CC.5.SL.4 Presentation of Knowledge and Ideas: Report on a topic or text or present an opinion, sequencing ideas logically and using appropriate facts and relevant, descriptive details to support main ideas or themes; speak clearly at an understandable pace.
CC.5.SL.5 Presentation of Knowledge and Ideas: Include multimedia components (e.g., graphics, sound) and visual displays in presentations when appropriate to enhance the development of main ideas or themes.

## Sequence of Lessons:

### Day One
1. Present the **World Biome Map** and identify the location of each biome.
2. Discuss how the location of each biome is defined by the characteristics of a particular region.

### Day Two

1. Read the informational text, **All About Biomes**, to gain an understanding of abiotic and biotic factors that contribute to the characteristics of each biome.
2. Highlight text evidence to support conclusions drawn from the text.
3. Explain text evidence to answer guided questions.

### Day Three
1. Define essential vocabulary related to each biome using the informational text.
2. Ask students to record their learning with both a picture and a written definition on an **All About Biomes Vocabulary** chart.
3. Use **Biome Vocabulary Flashcards** for additional practice and review.

### Day Four
1. Read information about various biomes to determine specific fauna/plants and animals from the **Biome Intro Presentation**.
2. Organize information from the presentation onto a graphic organizer.

### Day Five
1. Introduce project choices and explain the expectations for each **2020-21 Biome Choice Board Project**.
2. Allow students to choose the project and biome they will focus their research on: **Biome Project Options Google Form**

### Day Six
1. Discuss Plant Adaptations as a class.
2. Reinforce **Plant Adaptations** using informational text and guided questions.
3. Use adaptations as a research topic to guide student research during class.

### Day Seven
1. Discuss Animal Adaptations as a class.
2. Reinforce **Animal Adaptations** vocabulary using a matching activity.
3. Use adaptations as a research topic to guide student research during class.

### Day Eight
1. Discuss climate as a class: **What is Climate and Factors that Affect Climate**
2. Use climate as a research topic to guide student research during class.

### Day Nine-Twelve
1. Using research notes, students should begin compiling their information and effectively presenting it in the chosen format.

### Day Thirteen
1. Discuss the skills utilized in an effective presentation including volume, pacing, eye contact with the audience

## Day Fourteen-Fifteen

1. Students present their work to the class. Upon completion, the presenter asks questions to the classmates about their presentation.

**ASSESSMENT:**

**2020-21 Biome Choice Board Project Checklist**

**Examples of Student Work:**

**Taiga Biome Google Slide**
**Hannah West - My Biome Google Slides**
**Aubrey Lorentz - My Biome Google Slides**
**Tundra Tri Fold**
**Pampas/Grasslands Biome Report and Picture of Diorama**
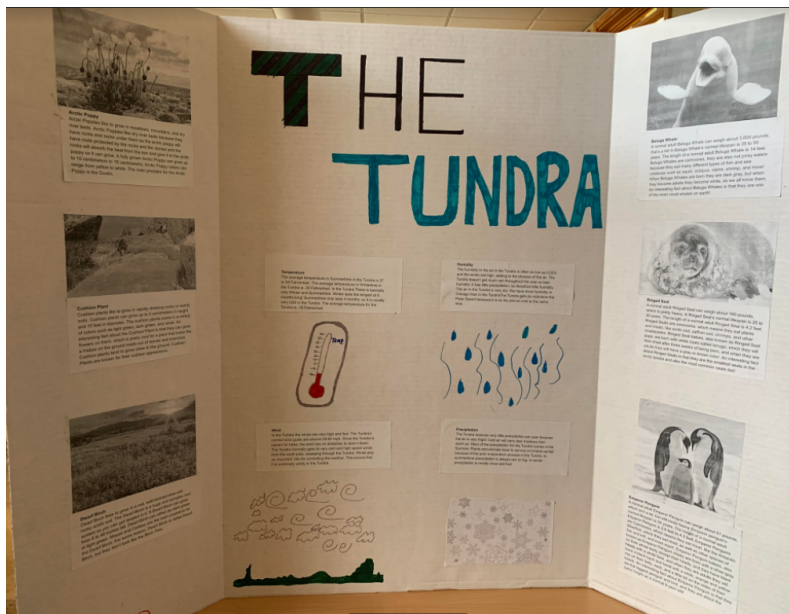
6th Grade Unit of Study

**6th Grade ELA: Unit 5 Overview**

**Unit Title:** Hero's Journey

**Grade level:** 6th          **Time Frame:** ~4-5 weeks

**Essential Question(s):**
- What techniques does an author use to engage a reader?
- How do myths, folktales, fairy tales, fables etc reflect information about a culture?

**Knowledge and skills:**
*Students will be able to...*
- Identify the steps of the Hero's Journey
- Cite evidence from a variety of mediums
- Compare and contrast historical tales with their transplanted versions
- Analyze literary texts for common elements and genre characteristics
- Collaborate to gather information and complete prewriting activities
- Use graphic organizers to develop characters, settings, conflict, and resolution
- Define: mythology, fairy tales, folktales, fables
- Understand oral traditions and their effect on folktales, fairy tales, and fables
- Target cultural norms and beliefs
- Write within the parameters of a prompt

<u>Standards</u>
**Reading: Literature**
*Key Ideas and Details*
1. Cite textual evidence to support analysis of what the text says explicitly as well as inferences drawn from the text.
3. Describe how a particular story's or drama's plot unfolds in a series of episodes as well as how the characters respond or change as the plot moves toward a resolution.
*Key Ideas and Details*
5. Analyze how a particular sentence, chapter, scene, or stanza fits into the overall structure of a text and contributes to the development of the theme, setting, or plot.
**Speaking and Listening**
*Presentation of Knowledge and Ideas*
5. Include multimedia components (e.g., graphics, images, music, sound) and visual displays in presentations to clarify information.
**Writing**
*Text Types and Purposes*
3. Write narratives to develop real or imagined experiences or events using effective technique, relevant descriptive details, and well-structured event sequences.
*Production and Distribution of Writing*

6. Use technology, including the Internet, to produce and publish writing as well as to interact and collaborate with others; demonstrate sufficient command of keyboarding skills to type a minimum of three pages in a single sitting.

RL 6.1 - Cite textual evidence to support analysis of what the text says explicitly as well as inferences drawn from the text.

RL 6.2 - Determine a theme or central idea of a text and how it is conveyed through particular details; provide a summary of the text distinct from personal opinions or judgments.

RL 6.3 - Describe how a particular story's or drama's plot unfolds in a series of episodes as well as how the characters respond or change as the plot moves toward a resolution.

RL 6.4 - Determine the meaning of words and phrases as they are used in a text, including figurative and connotative meanings; analyze the impact of a specific word choice on meaning and tone

RL 6.5 - Analyze how a particular sentence, chapter, scene, or stanza fits into the overall structure of a text and contributes to the development of the theme, setting, or plot.

RL 6.6 - Explain how an author develops the point of view of the narrator or speaker in a text.

RL 6.9 - Compare and contrast texts in different forms or genres (e.g., stories and poems; historical novels and fantasy stories) in terms of their approaches to similar themes and topics.
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RI 6.2 - Determine a central idea of a text and how it is conveyed through particular details; provide a summary of the text distinct from personal opinions or judgments.

RI 6.3 - Analyze in detail how a key individual, event, or idea is introduced, illustrated, and elaborated in a text (e.g., through examples or anecdotes).

RI 5.8 - Explain how an author uses reasons and evidence to support particular points in a text, identifying which reasons and evidence support which point(s).
--
W 6.3 - Write narratives to develop real or imagined experiences or events using effective technique, relevant descriptive details, and well-structured event sequences.

A - Engage and orient the reader by establishing a context and introducing a narrator and/or characters; organize an event sequence that unfolds naturally and logically.

B - Use narrative techniques, such as dialogue, pacing, and description, to develop experiences, events, and/or characters.

C - Use a variety of transition words, phrases, and clauses to convey sequence and signal shifts from one time frame or setting to another.

D- Use precise words and phrases, relevant descriptive details, and sensory language to convey experiences and events.

E - Provide a conclusion that follows from the narrated experiences or events.

W 6.4 - Produce clear and coherent writing in which the development, organization, and style are appropriate to task, purpose, and audience. (Grade-specific expectations for writing types are defined in standards 1-3 above.

W 6.5 - With some guidance and support from peers and adults, develop and strengthen writing as needed by planning, revising, editing, rewriting, or trying a new approach. (Editing for conventions should demonstrate command of Language standards 1-3 up to and including grade 6 here.)

W 6.6 - Use technology, including the Internet, to produce and publish writing as well as to interact and collaborate with others; demonstrate sufficient command of keyboarding skills to type a minimum of three pages in a single sitting.

W 6.9 - Draw evidence from literary or informational texts to support analysis, reflection, and research.

A - Apply grade 6 Reading standards to literature (e.g., "Compare and contrast texts in different forms or genres [e.g., stories and poems; historical novels and fantasy stories] in terms of their approaches to similar themes and topics").

--

SL 6.6 - Adapt speech to a variety of contexts and tasks, demonstrating command of formal English when indicated or appropriate. (See grade 6 Language standards 1 and 3 for specific expectations.)

--

L 6.1 - Demonstrate command of the conventions of standard English grammar and usage when writing or speaking.

C - Recognize and correct inappropriate shifts in pronoun number and person.*

D - Recognize and correct vague pronouns (i.e., ones with unclear or ambiguous antecedents).*

E - Recognize variations from standard English in their own and others' writing and speaking, and identify and use strategies to improve expression in conventional language.

L 6.5 - Demonstrate understanding of figurative language, word relationships, and nuances in word meanings.

A - Interpret figures of speech (e.g., personification) in context.

B - Use the relationship between particular words (e.g., cause/effect, part/whole, item/category) to better understand each of the words.

C - Distinguish among the connotations (associations) of words with similar denotations (definitions) (e.g., stingy, scrimping, economical, unwasteful, thrifty).

**Essential Vocabulary:**

| | |
|---|---|
| Archetype | Folklore |
| Monomyth | Fractured tale |
| Fairy tale/fable | Hero's Journey (3 parts, several sub-parts) |

**Teacher Resources:**
*Google Drive folder of resources
- Hero's Journey Prezi: https://prezi.com/m/k6bxm9naoxbb/the-heros-journey/
  - Student copy of outline for Prezi
  - Answer Key for Prezi
  - Google Form Quiz on Prezi
- What makes a hero video: https://youtu.be/Hhk4N9A0oCA
  - http://www.thecreativeeducator.com/2013/lessons/Heros-Journey lesson plan
- Hero's Journey Step Chart && Hero's Journey Step Chart with Definitions
- *CrashCourse Mythology* on Youtube:
  https://www.youtube.com/watch?v=iRCVcuA6yZQ&list=PL8dPuuaLjXtNCG9Vq7vdvJytS-F-xGi7
  - Pantheon: families of gods (Greek/Roman *caution, depends on audience maturity)
  - Creation: how the world/universe came to be
  - Heroes monomyth: Journey (have only watched 5 min in so far)
  - Mythological language/idiom
- Comic Planner for Hero's Journey
  - Digital Comic website: Storyboard That
- Steps of Hero's Journey/Movie Comp
- "Journey" Graphic Organizer
- Percy Jackson Unit, to accompany reading of *Percy Jackson: The Lightning Thief*
- Story Generator website
- Additional "assessment" resources linked below
- Weather Folklore
- Video Example of Fractured Tale (Leaping Beauty)

*List of Fairy Tales, Folk Tales, Legends and Myths from around the world:

Ali Baba and the Forty Thieves from the *1001 Nights*.

Anansi or Br'er Rabbit Stories

Arthur, Legendary King of Britain

Baba Yaga

The Bremen Town Musicians about aging animals who make a new life for themselves.

Donkey Skin

Epic of Gilgamesh

Doctor Faustus

The Flying Dutchman.

Sir Gawain and the Green Knight.

Kintaro, the Golden Boy

Legend of Ys

Merlin the Magician Rescues King Vortigern: Why the Red Dragon Is the Emblem of Wales

Momotaro, or the Story of the Son of the Peach

The Mouse Who Was to Marry the Sun.

Norse Ballads of Henry Wadsworth Longfellow.

- Thor and the Midgard Serpent.
- Thor's Hammer in the Alps.

The Pied Piper of Hamelin. The legend of a magic rat catcher, who -- when cheated out of his wages -- steals the town's children.

Saint George and the Dragon. An index page for the legendary saint

Sleeping Hero Legends. Migratory legends and folktales about heroes who, instead of dying, lie asleep awaiting a time of special need when they will rise up and defeat their nations' enemies.

Tatterhood, a tale from Norway about twin girls. The ugly one (our heroine) is spunky and resourceful; the beautiful one is uninteresting.

Other stories:

Changeling Legends from the British Isles. Fairies, trolls, elves, and devils kidnap human children, leaving their own demonic offspring in their place.

Jack o' Kent and the Devil

Hand of Glory. Legends about magic lights made from human hands.

The Panchatantra. Tales from ancient India.

**Sequence of Lessons**

Days 1 & 2: Notes on the Hero's Journey using Prezi and outline (provided to students), as well as Youtube video TedED

Day 3: Introduce students to "step chart" and pass out copies of *Percy Jackson: The Lightning Thief*. Students have approximately 3 weeks to read the novel and complete their step chart to track *Percy Jackson's* heroic journey each step of the way.

Days 4-6: Using side 2 of the step chart, watch "Hercules" in class, having students take notes for each step of Herc's heroic journey

Day 7: Introduce movie essay using steps chart for Hercules, work time on organizer

Day 8-9: Students write Hero's Journey essay using evidence from Hercules

Day 10: *Percy Jackson* week 1 check-in, using unit pages (linked below in resources) to begin character analysis

Day 11: Introduce students' personal heroic journey project (student choice of petal project or comic strip)

Days 12-19: Work time on project, mixed with *Percy Jackson* week 2 check-in, using root study from the unit resources. Presentations of project begin on Day 17

Day 20: Percy Jackson unit page on quotes with Hero's Journey

Day 21-24: Students continue work on *Percy Jackson*, Personal Hero's Journey visual project introduced

Day 25: continue work time on personal hero's Journey; introduction of research/writing below (*Percy Jackson* completed by day 30, use unit resources linked above as needed) to link myths (SS connection) to the next portion of the unit on fables/fairy tales.

Days 26-30: Students receive work time on fables/fairy tales writing

Day 31: Percy Jackson final (reflection on connection between Hero's Journey and the book)

Day 32-35: work time on personal Hero's Journey AND fables/ fairy tale writing

Day 36: Personal hero's journey due, author's chair

Day 37-40: Peer feedback, conferencing on fables/fairy tale writing (adapt the following writing specific unit plan):

**Sequence of Research/Writing Portion of Unit Lessons**

- **Day One:** Start with a graffiti board of what folktales, fairy tales, and fables they know and what was used in The Book of Lost Things. Think of movies, tv shows, knowledge of ancient mythology, or other books. Then discuss common themes of fairy tales. Ask for lots of examples! Then share Google Document with list of fairy tales/themes and the other with guidelines/rubric for the project. Erase some of the stories then have students put their name under stories to group them.

- **Day Two:** Desks will be made into groupings of four. They will have papers on their desks (six different stories) with either the Disney safe recounting of the fairy tale or the original Grimm version. They will read silently-pair with a partner of the same story-share with the opposing group. Then we will discuss as a class the differences between the two. Then we will talk about what Connolly did to the fairy tales and how he incorporated David and other twists into the stories and why it was interesting and how it contrasts with the two other versions. Have groups sign up for fairy tales.

- **Day Three:** We will diagram a plot together. They will diagram the plot (applet) of their chosen fairy tale. Students will jigsaw the jobs and be responsible for the completion of each item. If they didn't complete the diagram they will do that this first block. They will use chromebooks to research the roots of their stories and the main plot points that will be included in their versions.

- **Day Four:** Students will share their stories with the rest of the class. And read/work/etc, then discussion of what they have come up with and what roadblocks have popped up. **Plot Maps homework.**

- **Day Five:** Tell students they need to outline their stories for sharing with the class to create a cohesive story. Work on the stories outline. Demonstrate what a good outline looks like. Let them loose again on their projects during the second block. **Outlines due on the third work day.**

- **Day Six:** Students will map out their stories. What happens when and how it will affect the next stories. Students will brainstorm ideas together on what could be better for the other stories. Then they will start writing their stories. **First Drafts due Wednesday**. Plenty of time to write, write, write.

- **Day Seven:** Continue writing.

- **Day Eight:** Turn in First Drafts. We will go over [Peer Editing](#) with students. They will each have a role and will read accordingly.
- **Day Nine:** First Drafts are returned. Groups will continue reworking/editing their first drafts and projecting.
- **Day Ten:** Still writing and projects. Second and Final drafts will be emailed to us today.
- **Day Eleven:** All blocks are finishing the project. Making sure their poster is presentable, practising their presentations, and putting on the final touches.
- **Day Twelve:** Presentation of stories

### ASSESSMENTS
- [H.J. initial comp Quiz, using Google Forms](#)
- [Hero's Journey petals visual project](#)
- Writing rubric:

| CATEGORY | 5 points | 3 points | 1 point |
|---|---|---|---|
| **Plot** | It is very easy for the reader to understand the problem the main characters face and why it is a problem. The solution to the character's problem is easy to understand, and is logical. There are no loose ends. | It is fairly easy for the reader to understand the problem the main characters face but it is not clear why it is a problem. The solution to the character's problem is a little hard to understand. | It is not clear what problem the main characters face. No solution is attempted or it is impossible to understand. |
| **Content and Vocabulary** | Content and vocabulary are appropriate for an intended audience. | Content and vocabulary are somewhat appropriate for an intended audience. | Content and vocabulary are inappropriate for an intended audience. |
| **Character Development** | The story includes a protagonist and antagonist. The protagonist is well described in a way that the reader can visualize, hear and imagine their actions. The main characters grow and | The protagonist or antagonist is missing or not clearly identified. The author should have spent more time developing the characters. The main characters do not grow or evolve throughout the chapter. | Characters are not developed well and because of it, the story is confusing. The main characters do not grow or evolve throughout the chapter. |

| | | | |
|---|---|---|---|
| | evolve throughout the chapter. | | |
| **Creativity** | The story contains many creative details and/or descriptions that contribute to the reader's enjoyment. The author has really used his or her imagination. | The story contains a few creative details and/or descriptions, but they distract from the story. The author has tried to use his or her imagination. | There is little evidence of creativity in the story. The author does not seem to have used much imagination. |
| **Connection to Fairy Tale** | The story contains all major (80% - 100%) plot points of the chosen fairy and connects them creatively. | The story contains some (80%-60%) of the major plot points of the chosen fairy tale and connects them. | The story contains few (<60%) of the major plot points of the chosen fairy tale and does not connect them. |
| **Spelling and Punctuation** | There are relatively no spelling or punctuation errors in the final draft. | There are 4-6 spelling and punctuation errors in the final draft. | The final draft has more than 6 spelling and punctuation errors. |

**Student Work Samples:**

<u>**Hero's Journey: Prezi Notes**</u>

- Student sample

<u>*The Hero's Journey* Notes Outline</u>

- *The Hero's Journey* is also known as monomyth
- Joseph Campbell is a famous scholar who identified the archetype of the "hero's journey".
    - The definition of archetypes is images and ideas of expression that appear in art and mythology all around the world.
    - Some common archetypes are (examples in parentheses may be helpful): mother figure
    - Father figure
    - Hero
    - Maiden
    - trickster
- The three **main** parts of the Hero's Journey are
  1) departure
  2) initiation
  3) return
- Will every hero take every step of the hero's journey? YES    or      NO

- Some popular specific examples of the Hero's Journey in modern media include
  - mario
  - Lord of the rings
  - Harry potter
- Departure - Part 1 of the Hero's Journey is broken into three parts:
  1) Unusual birth or childhood
  2) Call to adventure
  3) Crossing the line to his normal life to the initiation
- Initiation - Part 2 of the Hero's Journey is broken into five parts:
  1) The challenge
  2) Supernatural helper or mentor
  3) The special weapon
  4) The abyss or temptation
  5) The transformation
- Return - Part 3 of the Hero's Journey is broken into two parts:
  1) The return home
  2) The mastery of two worlds

<u>Personal Heroic Journey</u>

- Student sample 1
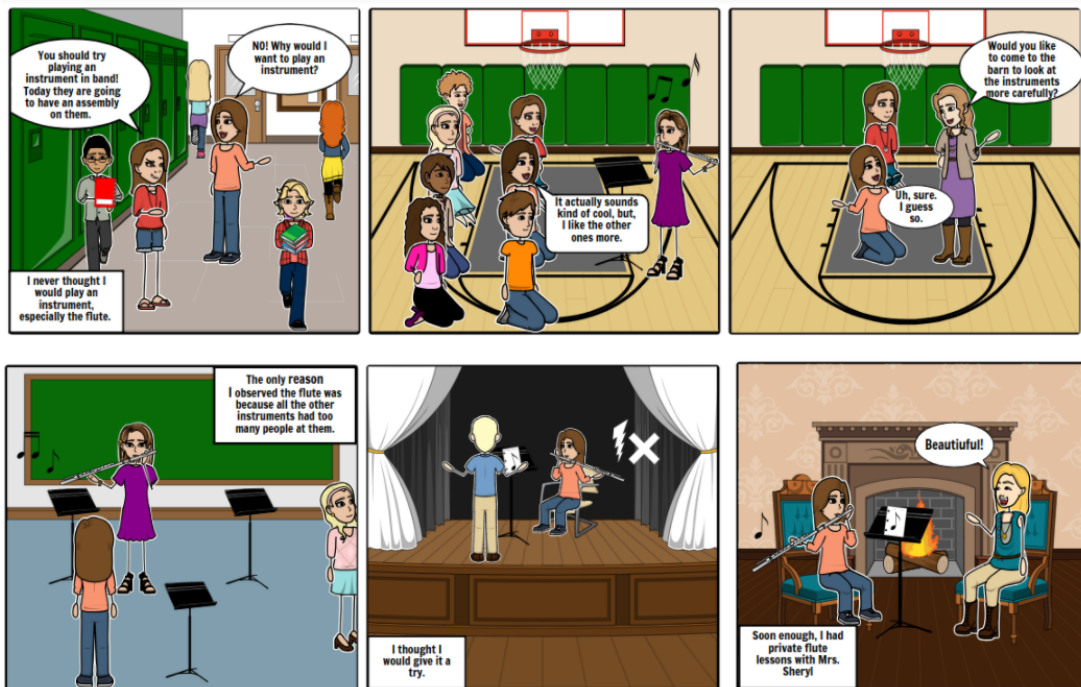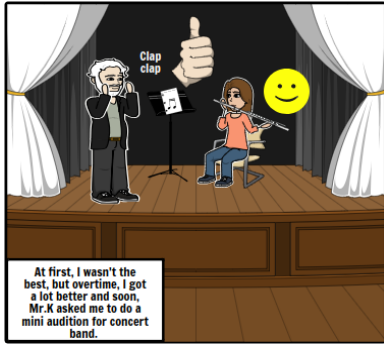
- Student sample 2
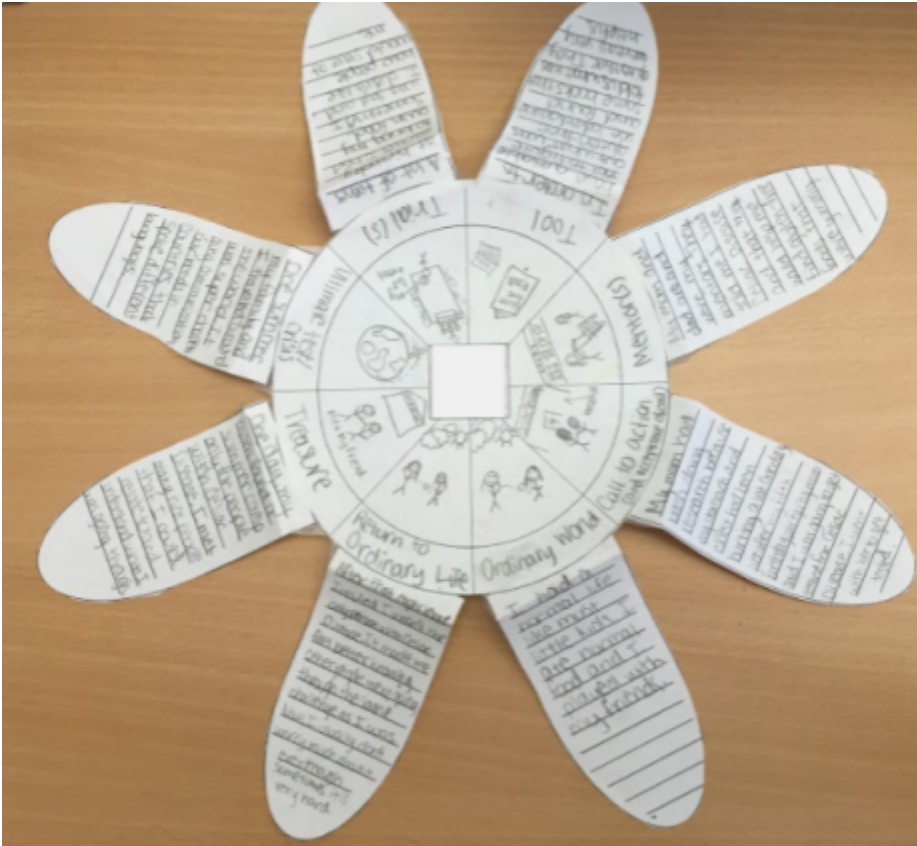
- Student sample 3
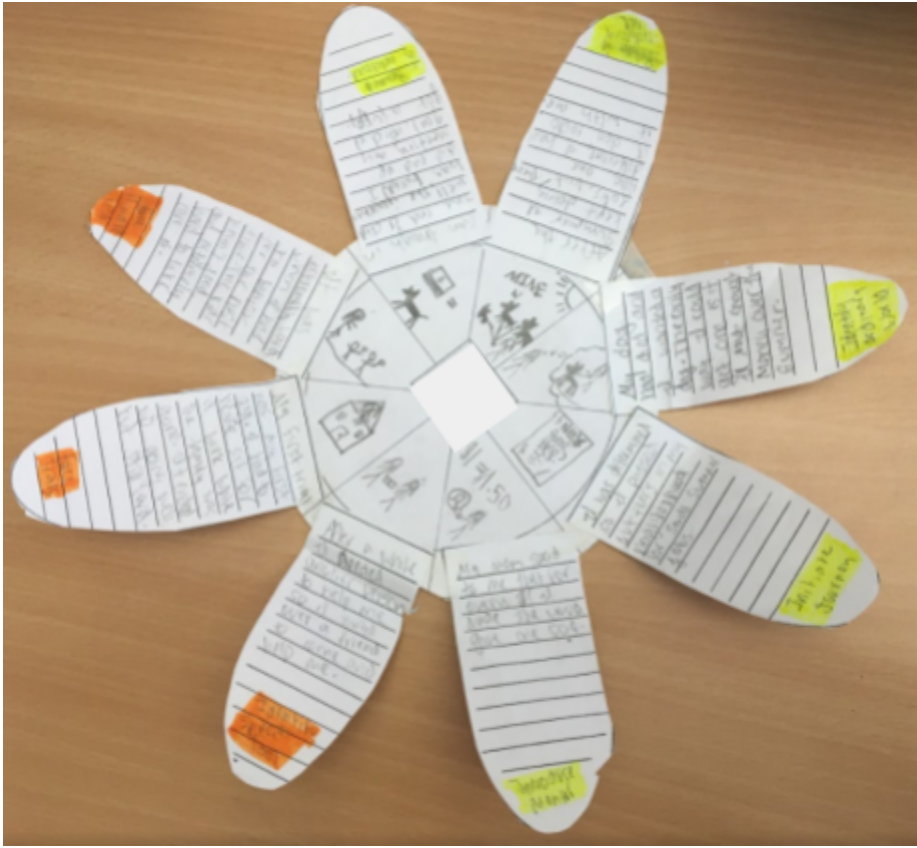


Percy Jackson/Hero's Journey Connection Writing Assignment
- Student sample 1

**Class:** ELA

**Prompt:** How do Percy's experiences in *The Lightning Thief* align with steps of the Hero's Journey? Write one (or more) paragraph(s) describing connections between what Percy goes through and the steps of the Hero's Journey that we have studied in class. Remember to use *evidence* from the text to support your claim (quotes, page numbers, chapter references). Use the checklist below to ensure you have created a strong written response:

---

*Did you...*

_____ begin your paragraph with a topic sentence that makes a claim?

_____ use evidence from *The Lightning Thief* that supports your claim?

_____ make clear connections to the Hero's Journey steps we have covered in class?

_____ close your response with a clear conclusion sentence?

---

**Response:**

Percy Jackson's experiences align with the steps in the Hero's Journey. There are multiple steps that he took to become a stronger, better hero in the end.

The first step in the Hero's Journey is an unusual childhood that sets them apart from everyone else. Percy had dyslexia and ADHD, but he didn't know exactly why yet until later in the book. Another unusual thing about his childhood is that he grew up without a father, and he did not know anything about him. On page 30 it states: "Then one day he set sail across the atlantic on an important journey and never came back."

Percy's first unusual experience was when his english teacher turned into a weird, flying creature. She says that Percy stole a lightning bolt, but he had no idea what she was talking about. Then Mr. Brunner threw Percy a pen. This pen was Percy's special tool he used throughout the rest of the book. He uncapped it and it turned into a sword! "What ho, Percy" he shouted, and tossed me the pen through the air." (Page 13 of The Lightning Thief)

Percy experienced a trial before he experienced his call to action and crossing the threshold. After the encounter with the 'Fury' (his english teacher), Grover (his best friend), and Percy's mom rushed Percy to a place called Camp Half-blood. That was where Percy started to figure out that he was different than everyone else. On the way, he fought the minotaur, which was his first trial. "Raaaarrr!" The monster turned toward me, shaking his meaty fists." (Page 54 of The Lightning Thief) While Percy had the victory of breaking off the minotaur's horn to kill him with, the minotaur crushed Percy's mother into gold dust. He thought she died, but she only went to the underworld.

When Percy woke up in camp half blood, he felt sick, but he soon felt well enough to walk around the camp with his friend Grover who he soon figured out was a satyr, and protector. While he was walking around, he met his old teacher, but he had a horse body. Mr. Brunner (who was then Chiron) became Percy's mentor. Chiron told Percy everything he needed to know about the camp, and more. He also explained that Percy was a half-blood because his mother was a mortal and his father was Poseidon. Chiron explained that Zeus' bolt was missing so the three main gods would start a war soon.

Percy's call to action was when Chiron told him he had to go on a quest to return the bolt to Zeus. He must complete this task by the summer solstice or there will be a war. On page 134 through 139 Percy and Chiron discuss this "So I have to find the stupid bolt", I said. "And return it to Zeus." Then Chiron asks "You agree then?"

When Percy crosses the threshold, he starts his quest with Grover and a girl named Annabeth, who was taking care of him when he came into the camp sick. "Just your typical summer-camp send-off by your typical centaur." (page 156 of The Lightning Thief)

A big part of the hero's journey is the challenges and trials the hero accomplishes. These trials are some of the things that make the transition from a boy to a hero. Percy's first trail during his quest was when he fought Medusa. Medusa tricked the three kids into thinking she was a nice old lady who would give them food. But after they suspected her to be a little creepy, she revealed herself as Medusa. If they looked at her, they would turn into stone, so Percy looked

through a mirror to find her, and he cut off her head with the sward Chiron gave him. "She lunged at me with her talons. I slashed up with my sword, heard a sickening 'shlock', then a hiss." (Page 183 of The Lightning Thief)

They meet the god Ares at a diner, and he asked them to find his shield and return it to him. Even though they were going to go off track, they did it anyway. When they got to the abandoned waterpark, They got caught in a trap for Ares to see Aphrodite and Hephestus. It was a close call but they eventually got out of the trap, and safely returned the shield to ares. He seemed annoyed to see them alive though.

They fought a reptile lady and her Chimera in the St. Louis Arch, and they got caught in a casino for five days but they didn't even know it! They only had one more day until the solstice! All these trials occurred while they were on their way to the entrance of the underworld to see if Hades had the bolt.

When they got to the underworld, they met Hades in his castle. They did all of that traveling, but Hades said he didn't have the bolt! What he did say was that he was missing his Helm of Darkness and he needed it returned. Now they had to return two things to two gods. All of a sudden, percy felt something heavy in his backpack, so he opened it up and found the bolt! Hades got really mad at Percy for lying even though he had no idea it was there. Percy, Grover and Annabeth figured out that Ares snuck the bolt into the backpack. That meant Ares stole the bolt. They needed to get out of there before Hades killed them. Earlier, a Nereid gave Percy three pearls to for when he is in need. Percy experienced a temptation when he had to choose between giving Hades the backpack, or using the pearls. "Go on, choose. Or give me the backpack and accept my terms." (Page 316 of The Lightning Thief) He used the pearls to get out of the underworld.

When they got out of the underworld, Percy fought Ares to get the helm. When Percy defeated Ares, he gave the helm to the furies (Hades' henchmen) to return to Hades.

Now he needed to go to Olympus to give the lightning bolt back to Zeus. He riskily got onto a plane to get back to New York. Once he got to Olympus though the Empire State Building, he saw Zeus and Poseidon sitting in huge thrones. Zeus was happy to have the bolt back, and Since Hades got his Helm, Hades gave Percy his mom back. Percy was just a boy from New York, but when he returned the bolt, he transformed into a hero.

Everyone was so happy to see him return back to Camp Half-blood, but he still needed to make a big decision. He had to balance the hero world and the normal world by deciding whether to stay at Camp Half-blood all year, or just for the summer. He decided to go home to see his mother and only come back to camp in the summer. "I asked Argus to take me down to cabin three so I could pack my bags for home." (Page 375 of The Lightning Thief)

It turned out that Ares stole the bolt and the helm and blamed it on Poseidon's kid so Poseidon would get blamed both ways. He wanted a three way war.

Percy Jackson changed from a little New Yorker, to a hero who returned the lightning bolt to Zeus.

- **Student Sample 2**

**Class:** ELA

**Prompt:** How do Percy's experiences in *The Lightning Thief* align with steps of the Hero's Journey? Write one (or more) paragraph(s) describing connections between what Percy goes through and the steps of the Hero's Journey that we have studied in class. Remember to use *evidence* from the text to support your claim (quotes, page numbers, chapter references). Use the checklist below to ensure you have created a strong written response:

---

*Did you...*

_____ begin your paragraph with a topic sentence that makes a claim?

_____ use evidence from *The Lightning Thief* that supports your claim?

_____ make clear connections to the Hero's Journey steps we have covered in class?

_____ close your response with a clear conclusion sentence?

---

**Response:**

Percy Jackson was a perfect example of the hero's journey. Percy fit into almost all of the hero's journey categories. It all started off, like most other heroes, with a weird childhood. Percy had lost his father before he was born, and his father was a god. He also had dyslexia and ADHD. On page 30 his mother said, "Then one day he set sail across the Atlantic on some important journey and never came back." Percy's call to action was when he realized that Zeus thought he had stolen the most important weapon in the world. The master lightning bolt. Mr. Brunner, or Chiron, told him that on page 135 by saying, "They are fighting over something valuable that was stolen. To be precise: a lightning bolt." That was Percy's call to action because that was when he first started to realize that he had to do something about it.

The next part of the hero's journey for Percy Jackson was crossing the threshold. This was when Percy first started getting ready for his journey. On page 149 Percy states, "It didn't take very long for me to pack." That instance was when he first started getting ready for the journey. Just the same as most other heroes, Percy had a special tool. It was a pen that was named, Riptide. When you uncapped riptide it would turn into a mighty sword, that could not hurt mortals. When Percy first got Riptide was when he fought Ms. Dodds. He gave it back to Mr. Brunner, and then Chiron (Mr. Brunner) gave it back to Percy when he started on his quest. "He pulled a pen from his coat pocket and handed it to me," was the exact quote from the story on page 153. Percy had two mentors on his journey. They were Grover and Annabeth. Chiron told Percy Grover was coming on page 147 when he said, "Two companions may accompany you. Grover is one." Later on that page, Annabeth was introduced. They helped Percy by helping him fight off all of the monsters and other mythical creatures they saw.

Percy encountered many trials on his journey. The first one he faced was Ms. Dodds, but the first real challenge was the minotaur. Percy was right on the edge of getting to Camp Half-Blood grounds when they got to the minotaur. Percy wrote, "Raaarrr! The monster turned toward me shaking his meaty fists," on page 54. Percy and Grover ended up getting to the camp, but his mother was sent to the underworld. The first monsters on the actual quest were the furies. They were on the bus that three heroes were on. Everybody got off the bus except for the three furies, Percy, Annabeth, and Grover. According to Percy on page 165, "The furies turned, baring their yellow fangs right at me." The next trial they faced on the quest was Medusa. They went into a restaurant in the middle of nowhere. The lady first started out as a nice person, but then turned into Medusa. On page 179, Percy wrote, "The sound of tiny snakes, right above me." Percy ended up slicing off medusa's head, and they covered it up and put it into a box. Percy had two major trials. The first one was with Hades. Hades thought Percy had taken his helm so he was also mad at Percy. Hades was very mad at him and he said this on page 314, "You came here with it, little fool, thinking you could threaten me!" Percy ended up reaching the surface and then having to face another trial. It was Ares. Percy and Ares got into a mighty sword fight. Percy made it sound very tense, writing on page 327, "He slashed again, and I was forced to jump onto dry land." Percy ended up defeating Ares by using the water to his advantage and then stabbed him in the ankle. Percy also had other trials like Procrustes, an attack from robotic spiders, and getting attacked by a lion and a monster on the St. Louis arch.

Percy's main temptation was whether he should save himself and his friends, or have to keep one of them in the underworld so he could take his mother. He wrote on page 315, "and there was my mother frozen in a shower of gold, just as she was at the moment when the minotaur began to squeeze her to death. He ended up taking all of his friends but was very sad doing so. Unlike most heroes, Percy didn't really have a transformation. You could say that it made him a better fighter, and problem solver. At the end of his journey, Percy returned home. His mom had been freed from the underworld so he went to his house first. When his mother first saw him on page 347 she said, "Percy! Oh, thank goodness. Oh, my baby." When Percy returned to Camp Half-Blood, they were greeted greatly because they were the first heroes to return to Camp Half-Blood since Luke.

As you can see, Percy Jackson was a great example of the hero's journey. He followed almost all of the steps and was a great hero.

**Water Quality**
**Unit Overview**

**Grade level:** 7
**Time Frame:** 30 Days
**Overarching Question:** How does our natural geography influence the way we live?

**Essential Questions:**
• How has land use changed over generations? What are the implications of the new land uses?
• How does land use affect the quality of the water?
• How do scientists study water quality in a particular region? Why is it important to conduct such studies?

**Enduring Understandings:**
• Water is dependent on how we use the land around us.
• Land use changes over generations but for generations to be sustainable, they need to look towards the future before making decisions.
• Scientists use specific universal processes to investigate new ideas and share their findings with others.

**Knowledge and Skills:**
Science:
• **I can** determine water quality using the following techniques: Biotic index of living species, turbidity, nitrate, and chloride level tests.
• **I can** work through the scientific method.
• **I can** articulately report their data and discoveries in a scientific
• **I can** use a dichotomous key and plant identification books to identify plant and animal species.
• **I can** identify specific examples of primary and secondary succession.
• **I can** identify common water pollutants and solutions.
• **I can** calculate a contour interval and use a contour interval to determine elevation

**Standards Addressed:**

| | | |
|---|---|---|
| MS-ESS3-3 | CCSS. Math 7.SPA.1 | CCSS. ELA WHST. 6-8.4 |
| MS-ETS1-1 | CCSS. Math 7.SPA.2 | CCSS. ELA WHST. 6-8.6 |
| MS-ETS1-3 | CCSS. ELA WHST. 6-8.1 | CCSS. ELA WHST. 6-8.7 |

**Lesson Overviews:**
Science: Air, Soil and Water Quality

| **Primary and Secondary Succession** ( 2 days)<br><br>**Vocabulary**:<br>- primary succession<br>- pioneer species<br>- early colonizers<br>- opportunists<br>- secondary succession | **Notes:**<br>Students will be introduced to the concept of ecological succession to best understand how nature begins or reclaims land.<br>   ● Overview Video<br>   ● Ecological Succession Guided Notes<br><br>**Activity**: Students will create a comic that depicts Secondary Succession. Students' rough drafts should be completed during class, and the finalized product should be finished for homework. Once completed, students will "Explain how the first comic strip would connect to the second comic strip"<br>   ● Comic Strip |

| | |
|---|---|
| **Topography** (8 days)<br><br>**Vocabulary**<br>- Topography<br>- contour interval<br>- index contour<br>- elevation | **Notes:** Students will be introduced to the idea of topography by watching a step by step tutorial that shows them how we use topography to explain the terrain of the land. As students are watching the video, they should be filling in their own notes to use as a guide for practice with contour intervals the following day.<br>    ● [Topography Introduction](#) Notes<br><br>**Station Practice:** Students will rotate around the room to check out a variety of different real life topography maps. Students will use the information provided to calculate the contour interval and then to find three different elevations marked.<br>    ● [Topography Stations](#)<br><br>**Independent Practice**: Students will be assigned topography practice to independently practice their skills for homework.<br>    ● [Independent Practice](#)<br><br>**Assessment**:<br>Students will complete this short topography exit ticket to assess their understanding of calculating on a topographic map using contour intervals<br>    ● [Topography Exit Ticket](#)<br><br>**Project:** Using the information that they have gathered about topography, students will create their own island topography map and build a cardboard model that correlates.<br>    ● [Build and Island Project](#) |
| **What is a Watershed and what does ours look like?** (4 days)<br><br>**Vocabulary:**<br>- watershed<br>- natural pathways<br>- man made pathways<br>- natural boundaries<br>- man made boundaries | **Intro**: What is a watershed? Students will watch a video that depicts what a watershed is and determine helpful vocabulary before diving in.<br>    ● [What is a watershed?](#)<br>    ● [Watershed Vocabulary Quizlet](#)<br><br>**Game**: Students will explore how our local watershed can be impacted by humans through Waterlife, a game created by NOAA<br>    ● [Waterlife](#)<br><br>**Lab**: Students will create a mini-watershed by crumpling a piece of paper. They will mark the highest elevation points with a water soluble marker, then spray with water. Students will then map how water travels in order to discover what a watershed is and how it impacts our ecosystem.<br>    ● [Watershed Lab Day One](#)<br>    ● [Watershed Lab Day Two](#)<br><br>**Notes:** Students will then do a short reading about topographical maps and how to determine watershed boundaries from the information given. We will then look at our watershed and determine where the highest elevation is and where the water will travel to.<br>    ● [Watershed Reading and Activity](#) |
| **Topography & Watersheds** (1 day) | **Notes**: Students will look at a map of an area for a proposed subdivision and draw in the watershed boundaries, as well as any other watershed information they can gather. |

| | ● [Watershed Reading and Activity](#) <br> ● [Watershed Mapping Activitiy](#) |
|---|---|
| **Pollution and Watersheds** (5 days) <br><br> **Vocabulary:** <br> - Point Source Pollution <br> - Non-Point Source Pollution <br> - Sediments <br> - Petroleum products <br> - Mercury <br> - Acid Rain <br> - Phosphorus <br> - Nitrogen <br> - DDT <br> - PCB <br> - Heated water <br> - Animal waste | **Intro**: <br> Students will watch a video on different types of pollution that impact our waterways. <br> ● [Video](#) <br><br> **Jigsaw Project**: <br> Working in groups of 3-4, students will become an expert on a type of water pollution. Students will present their findings to the class via poster. While students are presenting, others will be responsible for taking brief notes via a graphic organizer. <br> ● [Water Pollution Project](#) <br><br> **Lab**: <br> Using the models created earlier, students will create a lab that simulates what happens to our watershed when pollution is introduced. <br> ● [Water Pollution Lab](#) <br><br> **Review**: <br> Students will use the picture provided to locate and explain 5 different ways our watersheds can become polluted. <br> ● [Pointsource vs. Non-Point Source Identification](#) |
| **Watershed Assessment** | **[QUIZ](#)** |
| **Abiotic vs. Biotic Factors** (2 days) <br><br> **Vocabulary:** <br> - Biotic <br> - Abiotic | **Intro**: <br> Students will watch a brief video to explain the difference between biotic and abiotic factors of an ecosystem. We will then work together to identify different biotic and abiotic factors in an ecosystem, explain how they work together, and diagram an ecosystem. <br> ● [Video](#) <br> ● [Abiotic vs. Biotic Factors Worksheet](#) |
| **What is Water Quality, and How do We Test it?** (5 days) <br> **Vocabulary:** <br> -Nitrate <br> -Chloride <br> -Turbidity <br> -Organism sensitivity <br> -Dichotomous Key <br> -Micro-invertebrates <br> -Macroinvertebrates <br> -Biotic Index | Biotic Testing <br> Students will explore how scientists use biotic factors to determine the health of a lake or stream. Begin by introducing "What is a Macroinvertebrate". Students will learn what they are and how they are used to assess water quality. We will then conduct research on different types of macroinvertebrates we may encounter in our ponds/lakes and create an information observation log through research. Emphasis on pollution tolerance levels. <br> ● [Video](#) <br> ● [Pond Life Observation Log](#) <br> Students will learn what a dichotomous key is and how to use it by looking at a key for fictitious animals. Using that base, students will learn the difference between macro and micro invertebrates by making observations of a dichotomous key. (Book copy for students in Binder) <br><br> Finally, Students will then split between Lake Leopold and Prairie Smoke Pond to collect water samples, and organism samples. Students will catch organisms in a bucket, make observations, and release back to the lake. |

| | Recording identified species along the way. Students will use the keys, nets, and other materials needed to conduct a macro-invertebrate lab. Students will catch their macro-invertebrates, determine their tolerance, and then release them back. <br> ● Biotic Testing Recording Sheet (In Water Testing Backpack EE Closet) <br><br> Abiotic Testing <br> After testing for biotic factors, students will then take a look at the different ways that we can use abiotic factors to assess the health and quality of water in our local lakes and ponds. <br> ● What's in out Water <br> ● Pretesting Research- Students will look through the testing kits and run "mock" testing to familiarize themselves with the steps for testing and the materials presented. <br> Students then will collect samples from the lake and run several different chemical tests to assess the nitrogen, phosphorus, dissolved oxygen, and turbidity levels in Lake Leopold and Prairie Smoke Pond. <br> ● Abiotic Lab |
|---|---|
| **Assessment** | Water Quality Health Assessment- Prairie Crossing Homeowners Association <br> ● Students will take everything that they learned to test the quality of the water in both Prairie Smoke Pond and Lake Leopold. Students will use the water samples collected the day before to test for water quality. Students will analyze the data and draw conclusions about the quality of the water in the Prairie Crossing Community. Students will create a slideshow that includes an assessment of the lake/pond based upon biotic and abiotic testing and make recommendations for improving the quality of water. |

# Ecological Succession Notes

**Ecological Succession**- the _____ over _____ of organisms in a community. (Diversity over time)
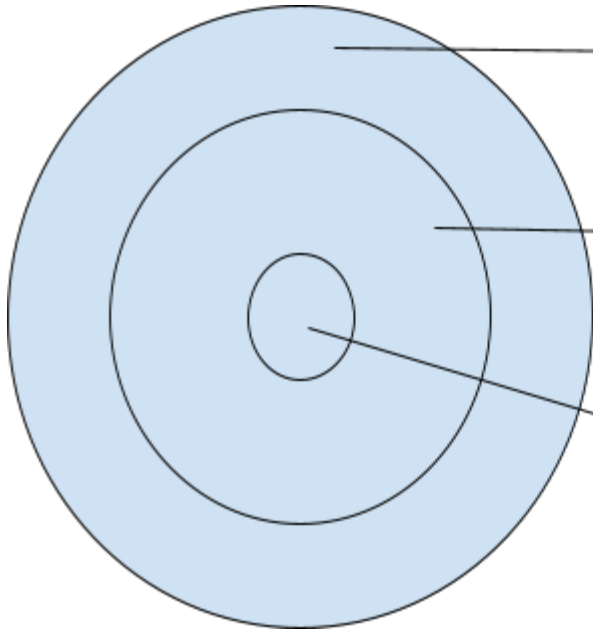
**Community-** many _____ of many _____ in an area

Ex:

**Population**- A group of _____ than one type of _____ in an area

Ex:

**Organism-** _____ type of _____ _____ in an area

Ex:

## Primary Succession
**-** Area is brand new where _____ _____ exists
Examples:

## Secondary Succession
- Coming back a _____ time
- Caused by a _____
- Soil still _____; faster
Examples:

**Steps to succession:**
1. Pioneer Species- plants that will _____ an area first (moss and lichen)
2. Pioneer species slowly break down rock into plant friendly substrate
3. Newly formed soil exists
4. Small _____ plants (grasses and weeds) occur
5. Shrubs and bushes occur
6. Trees form
7. Animals come, we have reached our _____ _____

## Primary Succession

| | | | |
|---|---|---|---|
| | | | |

## Secondary Succession

| | | | |
|---|---|---|---|
| | | | |

Q: Explain how the first comic strip would connect to the second comic strip in real life:

_____
_____
_____
_____

**Topographic Maps** (aka- Contour Maps) show _____ (height above or below sea level) and _____ by showing _____.

**Topographic Map Features:**

**1. Contour interval-** the _____ in elevation between

_____ (one right after the other) contour lines

**2. Index contour lines-** heavy, _____ contour lines that usually have the _____ written

**On the maps below: Highlight an index contour line in yellow & calculate the contour interval**
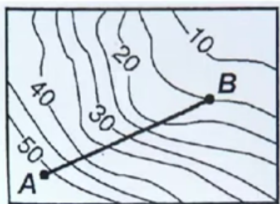
(50-40) / 2 =

(100-75) / 1 =

Calculate below:
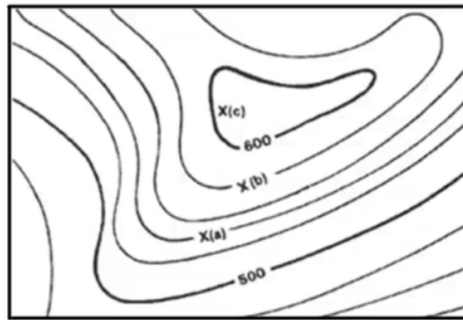
Contour lines represent meters

Contour interval:

Elevation of Point A:

Elevation of Point B:

**Topographic Map Rules:**

**1.** The _____ lines are, the _____ the slope. The more spread out the lines are the _____ the slope.

**2.** Contour lines bend _____ and form a _____ when crossing a river, stream or creek. The V points _____ the source.

**3.** _____ of consecutively smaller contour lines represent _____ or _____

**4.** The highest _____ of a hill is just _____ the value of what the _____ contour line would be.

**5.** Areas where land dips down are called _____. They are shown with small marks called _____

**6.** At a _____, the first hachured line has the same elevation as the previous line.
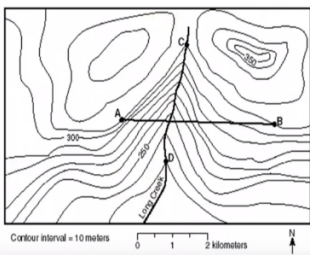
- **Label the water source** .
- **Draw an arrow for the direction the water flows.**

- **What is the elevation at the top of the hill?**

Contour interval = 20 meters
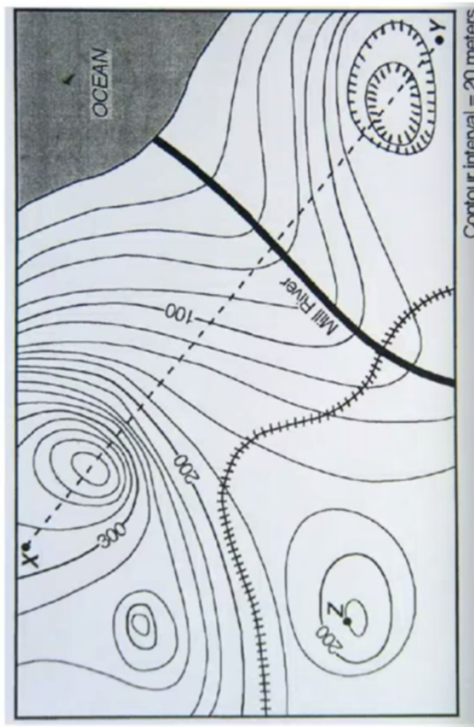
Name_____

# Topography Map Stations

contour interval = _____

elevation of A    = _____

elevation of B    = _____

elevation of C    = _____

## To determine the **contour interval** :

❶ Find adjacent dark lines that
   are labeled & subtract

❷ Divide by 5 because there are 5
   spaces between dark lines

2400 - 2200 = 200

200 ÷ 5 = (40)
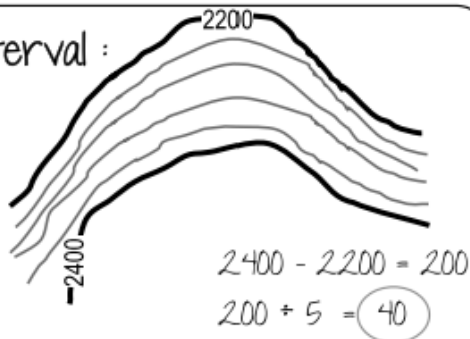
## Station 2

contour interval = _____

elevation of A    = _____

elevation of B    = _____

elevation of C    = _____

## Station 3

contour interval = _____

elevation of A    = _____

elevation of B    = _____

elevation of C    = _____

## Station 4

contour interval = _____

elevation of A    = _____

elevation of B    = _____

elevation of C    = _____

## Station 5

contour interval = _____

elevation of A    = _____

elevation of B    = _____

elevation of C    = _____

## Station 6

contour interval = _____

elevation of A    = _____

elevation of B    = _____

elevation of C    = _____

## Station 7

contour interval = _____

elevation of A    = _____

elevation of B    = _____

elevation of C    = _____

## Station 8

contour interval = _____

elevation of A    = _____

elevation of B    = _____

elevation of C    = _____

## Station 9

contour interval = _____

elevation of A    = _____

elevation of B    = _____

elevation of C    = _____

## Station 10

contour interval = _____

elevation of A    = _____

elevation of B    = _____

elevation of C    = _____

# Copy of Topography Stations

**Station 1**
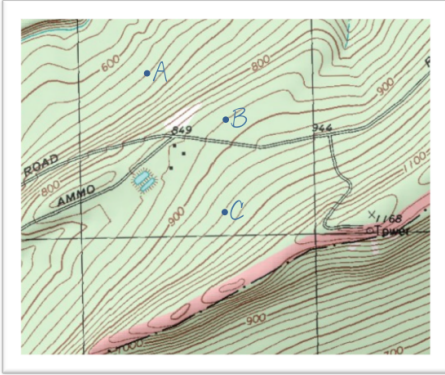


**Station 3**
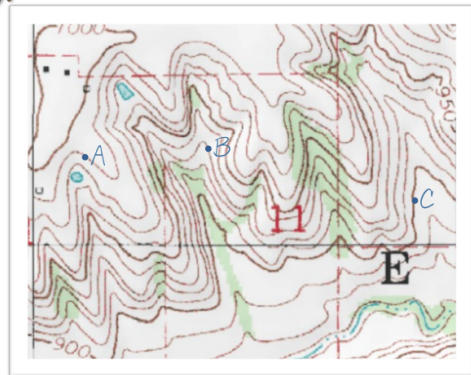


**Station 2**
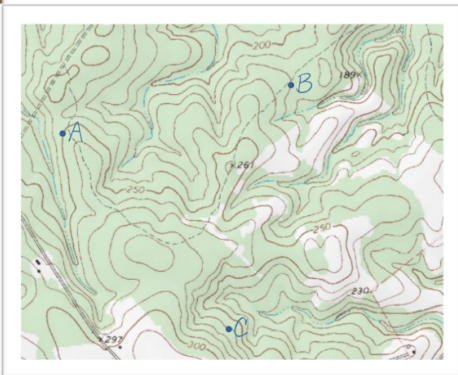


**Station 4**
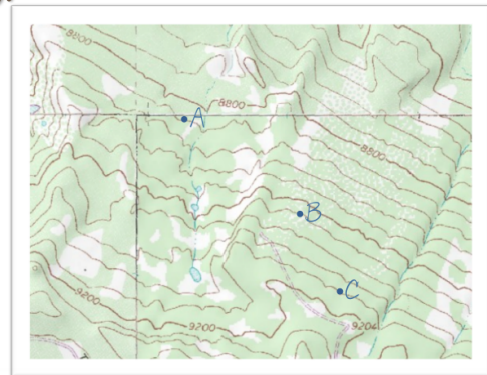


**Station 5**
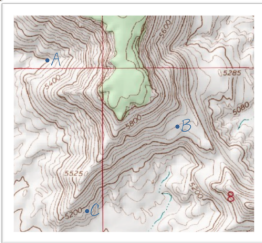


**Station 7**
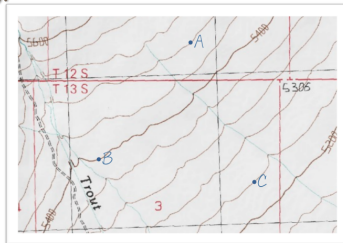


**Station 9**
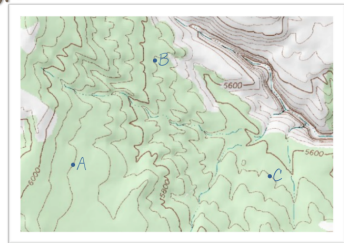


**Station 6**
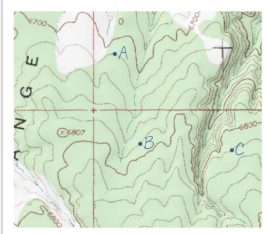


**Station 8**



**Station 10**
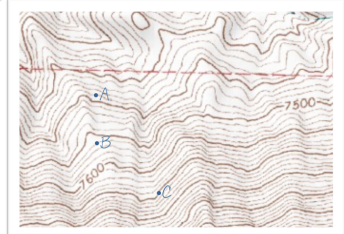
Name: **Key**       Date: _____     Period: _____
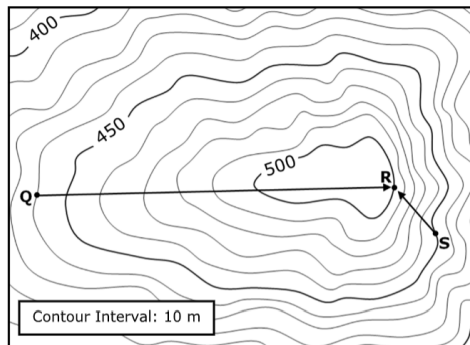
## Independent Practice: Topographic Maps

1. What is the elevation in meters of point X? **260 m**
2. What is the elevation in meters of point Y? **220 m**
3. What is the elevation in meters of point Z? **140 m**
4. What is the difference in elevation in meters between points X and Y?

    **40 m**

5. What is the difference in elevation in meters between point Y and the highest point on this landform?

    **198 m**

6. What is the difference in elevation in meters between points X and Z?

    **120 m**

Contour Interval: 20 m
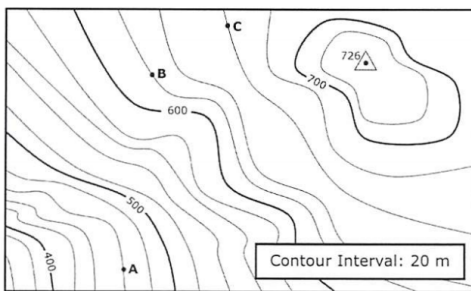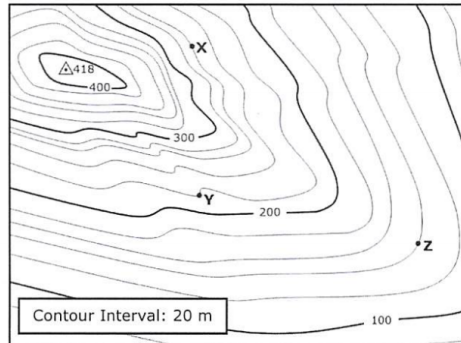
7. What is the elevation in meters of point A? **460 m**
8. What is the elevation in meters of point B? **620 m**
9. What is the elevation in meters of point C? **660 m**
10. What is the difference in meters between the two points labeled A and C?

    **200 m**

11. What is the difference in elevation in meters between point B and the top of the hill? Record your answer in the boxes below. Be sure to use the correct place value.

| 1 | 0 | 6 | . | | |
|---|---|---|---|---|---|

Contour Interval: 20 m

12. What is the elevation in meters of point F? **740 m**
13. What is the elevation in meters of point G? **800 m**
14. What is the elevation in meters of point H? **760 m**
15. The location of two hikers is marked on the topographic map to the right as points F and H. Each hiker climbed to point G along the path indicated by the arrow. What was the change in elevation for the hiker that took the steepest path to point G?

    **60 m**

16. What is the difference in elevation in meters between the starting points of the two hikers?

    **20 m**

Contour Interval: 10 m

Contour Interval: 10 m
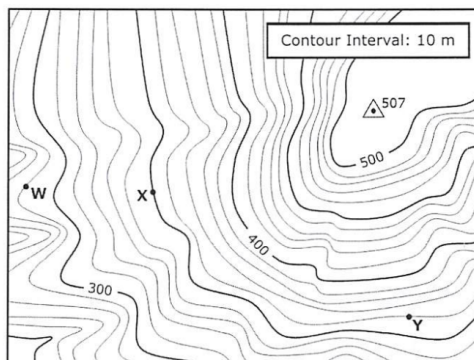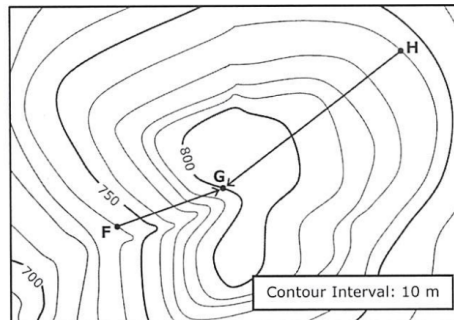
17. What is the elevation in meters of point W? **290 m**
18. What is the elevation in meters of point X? **350 m**
19. What is the elevation in meters of point Y? **360 m**

20. A hiker is standing at point X. What will be the change in height in meters for this hiker when she reaches the highest point on the hill?

    **157 m**

21. What is the difference in meters between the two points labeled W and Y?

    **70 m**

22. What is the difference in elevation in meters between point Y and the highest point on this hill? Record your answer in the boxes below. Be sure to use the correct place value.

| 1 | 4 | 7 | . | | |
|---|---|---|---|---|---|

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# Entrance Ticket

Name: _____

Date: _____

## Topographic Maps
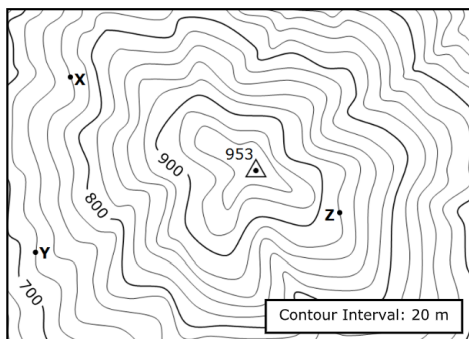


Contour Interval: 20 m

1. What is the elevation in meters of point X? _____
2. What is the elevation in meters of point Y? _____
3. What is the elevation in meters of point Z? _____
4. What is the difference in elevation in meters between points Y and Z? _____
5. What is the difference in elevation in meters between points X and Z? _____
6. What is the difference in elevation in meters between point X and the highest point on this landform? _____

---

Name: _____

Date: _____

## Topographic Maps
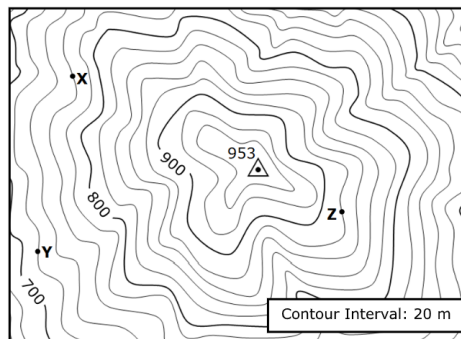


Contour Interval: 20 m

1. What is the elevation in meters of point X? _____
2. What is the elevation in meters of point Y? _____
3. What is the elevation in meters of point Z? _____
4. What is the difference in elevation in meters between points Y and Z? _____
5. What is the difference in elevation in meters between points X and Z? _____
6. What is the difference in elevation in meters between point X and the highest point on this landform? _____

---

**Use the topographic map below to answer the following questions.**
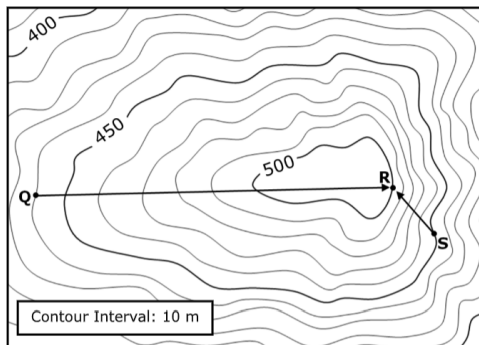


Contour Interval: 10 m

7. What is the elevation in meters of point Q? _____
8. What is the elevation in meters of point R? _____
9. What is the elevation in meters of point S? _____
10. The location of two hikers is marked on the topographic map above as points Q and S. Each hiker climbed to point R along the path indicated by the arrow. What was the change in elevation for the hiker that took the steepest path to point R?

_____

11. What is the difference in elevation in meters between points Q and S? _____

---

**Use the topographic map below to answer the following questions.**



Contour Interval: 10 m

7. What is the elevation in meters of point Q? _____
8. What is the elevation in meters of point R? _____
9. What is the elevation in meters of point S? _____
10. The location of two hikers is marked on the topographic map above as points Q and S. Each hiker climbed to point R along the path indicated by the arrow. What was the change in elevation for the hiker that took the steepest path to point R?

_____

11. What is the difference in elevation in meters between points Q and S? _____

# Build an Island

## INTRODUCTION

For this assignment, you will be creating a topographic map and three-dimensional model of a fictional island that you have designed. You will start by exploring some basic information about topographic maps and how they are created. See the **Background Information** section below for directions on how to do this. You may then begin by drawing a map of your island by following the **Part 1 Instructions** found below. After drawing your island, you must get it approved by your teacher. Approval will take place during class on ___Thursday, September 7___ Once your map is approved, you may begin building your model by following the **Part 2 Instructions** found below. The final map and model is due in class on ___Tuesday, September 12___

## BACKGROUND INFORMATION

Before drawing your map, please read through the following explanation and description of topographic maps. You must also visit the "topos" page of our website (www.83science.com/topos.html) for images, animations, videos, and other helpful resources.

A **topographic map** is the two dimensional representation of part of the Earth's three dimensional surface, drawn to scale. Also called a "topo" map. The features shown on topographic maps may be divided into three groups:

1. relief, which includes hills, valleys, mountains, etc.
2. water features, including lakes, ponds, and streams
3. cultural features, man-made features like bridges, canal, buildings, and roads

**Relief** is the difference in elevation between any two points. Where relief is low, the area appears to be relatively flat as in river valleys or broad, flat uplands. When relief is high, the area is steep, as in rugged mountainous terrains. Relief is shown on a contour map by contour lines.

A **contour line** is an imaginary line on the Earth's surface connecting points of the same elevation. A map's **contour interval**, is the difference in elevation between adjacent contour lines and must be consistent for a given map, though they may change from map to map. Usually every fifth contour line is printed heavier than the others and bears the elevation above sea level (an "index contour line").

The **map scale** expresses the relationship between distance on the map and the true distance on the Earth's surface. This is generally expressed as a ratio or a fraction, such as 1:24,000 or 1/24,000. The numerator, usually 1, represents map distance, and the denominator, a large number, represents ground distance. Thus, 1:24,000 means that a distance of 1 unit on the map represents 24,000 such units on the ground. The unit here is not important — it could be meters, feet, or inches. What is important is the relationship between the map distance and the true ground distance.

### Rules of Contour Lines

1. Every point on a given contour line is of the exact same elevation; that is, contour lines connect points of equal elevation.
2. Contours do not cross or intersect each other (except in the rare case of an overhanging cliff, in such a case, the hidden contours are dashed).
3. All contours eventually close to form an irregular circle or run off the map.
4. Contours near the upper parts of hills form closures (circles). The top of a hill is higher than the highest closed contour.
5. Contours are widely spaced on gentle slopes. 6. Contours are closely spaced on steep slopes.
6. Each adjacent contour line must maintain the same increase or decrease in elevation.
7. Where a contour line crosses a stream or valley, the contour bends to form a "V" that points upstream or valley. In the upstream direction the successive contours represent higher elevations.
8. Depressions are shown by hatched contours. Hatched contours are contours with short lines on the inside pointing downslope. The bottom of the depression is lower than the lowest closed contour.

## PART 1 INSTRUCTIONS

1. On a piece of printer paper (not looseleaf!), please **neatly** draw a topographic map of an island. You may need to try it a few times before you get it the way you want it. Do it in pencil first, then you should go over it in marker to make the lines and other features stand out.

Your map MUST include the following features:
  ✓ A minimum of six contour lines
  ✓ A minimum of one high point (a mountain peak), marked with the maximum elevation (a "spot elevation")
  ✓ A river
  ✓ A compass rose
  ✓ A statement of the contour interval
  ✓ A map scale
  ✓ A minimum of one depression
  ✓ Any landmarks or features that would be fun to show, such as roads, buildings or a lake.

2. Show your completed map to your teacher for approval before beginning part 2.

## PART 2 INSTRUCTIONS

1. Make a photocopy of your map. This is very important as you will need to cut your map up and you don't want to destroy your original. Remember, to get full credit, you must submit both a map and a model.

2. On your photocopied map, cut out the lowest elevation which should be the outermost and biggest circle, or contour line. There will be smaller circles in the middle. Ignore those for now. Trace your cut-out on the material you are making the model out of and cut it out (either foam board or thick cardboard). This is the base of your 3-D model.

3. Repeat this procedure for the rest of the lines on the topographic map. Cut out each contour line circle, trace onto the material, and cut out the material. Your circles should get smaller and smaller. Go ahead and discard your cut-up map pieces once you have the cut-outs to keep. Number the cutouts. Be sure to keep the cut-outs stacked up in order, so the biggest piece is on the bottom.

4. Glue or attach each cut-out to one below it. Let the glue dry.

5. Add color to show the features such as rivers, lakes, roads, etc. and label your model.

6. Create a Compass Rose on your map with four arrows that designate North, East, South, and West.

7. Add a Scale, which will represent the distance. For example, one inch represents one mile.

8. Add a Legend or Key to the elements on your map, and a statement of the contour interval.
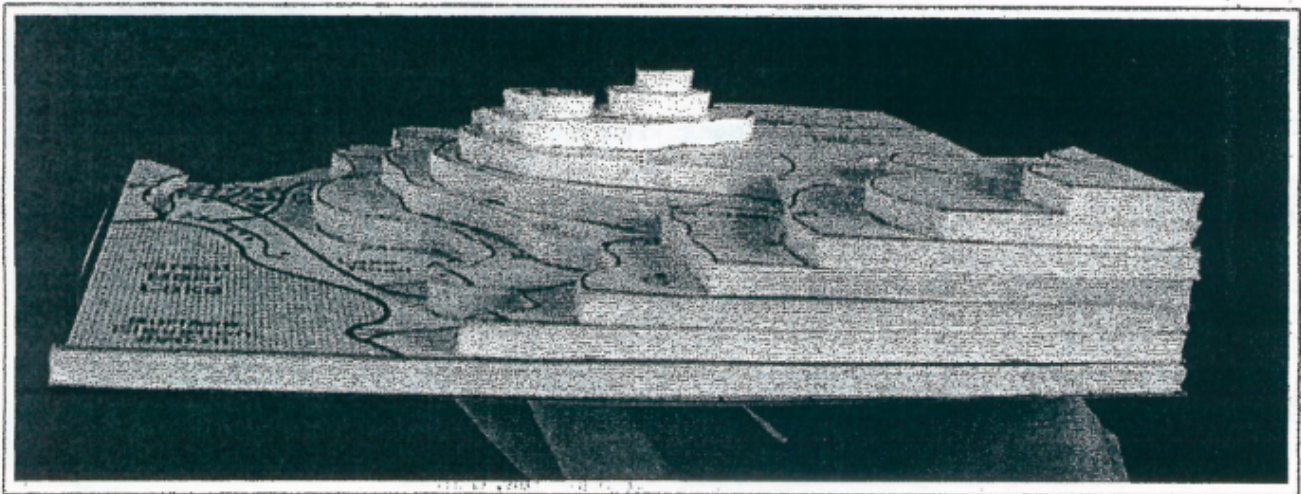
# Topographic Mapping Symbols

| Symbol | Description | | Symbol | Description |
|---|---|---|---|---|
| | Primary highway, hard surface | | | Boundary: national |
| | Secondary highway, hard surface | | | Boundary: state |
| | Light-duty road, hard or improved surface | | | Boundary: county, parish, municipio |
| | Unimproved road | | | Boundary: civil township, precinct, town, barrio |
| | Trail | | | Boundary: incorporated city, village, town, hamlet |
| | Railroad: single track | | | Boundary: reservation, national or state |
| | Railroad: multiple track | | | Boundary: small park, cemetery, airport, etc. |
| | Bridge | | | Boundary: land grant |
| | Drawbridge | | | Township or range line, U.S. land survey |
| | Tunnel | | | Section line, U.S. land survey |
| | Footbridge | | | Township line, not U.S. land survey |
| | Overpass/Underpass | | | Section line, not U.S. land survey |
| | Power transmission line with located tower | | | Fence line or field line |
| TELEPHONE | Landmark line (labeled as to type) | | +   + | Section corner: found/indicated |
| | | | | Boundary monument: land grant/other |
| | Dam with lock | | | |
| | Canal with lock | | | Index contour |
| | Large dam | | | Supplementary contour |
| | Small dam: masonry/earth | | | Mine dump |
| | Buildings (dwelling, workplace, etc.) | | | Dune area |
| Cem | School/Church/Cemeteries | | | Sand area |
| | Buildings (barn, warehouse, etc.) | | | Tailings |
| Water Tank | Tanks; oil, water, etc. (labeled only if water) | | | |
| o Oil   o Gas | Wells other than water (labeled as to type) | | | |
| ▲   X | U.S. mineral or location monument/Prospect | | | Glacier |
| X̂   X | Quarry/Gravel pit | | | Perennial streams |
| ▣   Y | Mine shaft/Tunnel or cave entrance | | o   ⌒ | Water well/Spring |
| I   ⫟ | Campsite/Picnic area | | | Rapids |
| ⊙   ƌ | Located or landmark subject/Windmill | | | Channel |
| | Exposed wreck | | | Sounding/Depth curve |
| | Rock or coral reef | | | Dry lake bed |
| | Rock: bare or awash | | | |
| △ | Horizontal control station | | | Woodland |
| BM X₅₄₅   X₅₄₆ | Vertical control station | | | Submerged marsh |
| 213   +⁷⁶ | Road fork/Section corner with elevation | | | Orchard |
| X 2650 | Checked spot elevation | | | Vineyard |
| X 2650 | Unchecked spot elevation | | | |

Right column lower section:

| Symbol | Description |
|---|---|
| | Intermediate contour |
| | Depression contours |
| | Levee |
| | Large wash |
| | Tailings pond |
| | Distorted surface |
| | Gravel beach |
| | Intermittent stream |
| | Aqueduct tunnel |
| | Falls |
| | Intermittent lake |
| | Small wash |
| | Marsh (swamp) |
| | Land subject to controlled inundation |
| | Mangrove |
| | Scrub |
| | Wooded marsh |
| | Bldg. omission area |

From *Topographic Maps* (Issued by the U.S. Department of the Interior/Geological Survey) U.S.G.P.O.: 1990—252-213

# Watershed Notes

Video: https://www.youtube.com/watch?v=2pwW2rlGIa8

Use the website above to create your own notes on watersheds in your ISN on **page 6**. When making your notes, remember to be creative, add color, and make it your own!

**Definitions:**
- Watershed
- Drainage divide
- HUC

**Other Information to Include:**
- Other names for a watershed
- What is a watershed defined by
- Why are watersheds important?
- Estimating how much water is in a watershed and how much will run downstream

# Building a Watershed Model
## Day One

We know that new water reaches the ground in the form of precipitation. Water that does not evaporate or get absorbed as ground water drains into a body of water as surface runoff. A variety of factors influence the amount of surface runoff that flows into a river. One major factor is the type of land cover found on the landscape.

What other factors could affect surface runoff?

In this activity you will predict how water flows into rivers and streams. You will be making a model of a landscape that includes multiple watersheds. You will use paper to form hills and valleys and a plastic bag to represent the surface of the earth. After you write down your predictions about how you think the water will flow in your model, you'll use a spray bottle to simulate a rainstorm. The purpose of this model is to explore the factors that determine how rivers and streams are formed.

**Procedure**
1. With your group, create your landscape. Crumple pieces of paper and arrange them on the tray Design your landscape so that the paper forms **taller mounds around the outer edges** of the tray and **shorter mounds in the middle**.

2. Place the plastic bag over the crumpled newspaper. Secure the tablecloth along the perimeter by taping it to the tray.

3. On your model, use a **RED** permanent marker to **label the areas of high elevation with a "H"**. Label the areas of **low elevation with an "L"**.

4. Before moving forward, answer the following questions in **complete sentences**:
   a. What is the definition of a watershed?



   b. What are the highest elevations and lowest elevations on your landscape?



   c. Where will water go if rain falls on your model?



   d. Where will rivers and streams develop on your model?

5.  Using a **BLUE** permanent marker, draw on the bag where you predict the rivers and streams will form. **USE ARROWS** to show which direction you predict the water will flow.

6.  Using the blue permanent marker, draw **circles** on the bag where you think puddles will form, or where you expect water to collect.

7.  Get your watershed model checked by the Teacher: _____

8.  In the box below, draw a topographic map of your model. You and your group members should have similar maps. I suggest drawing in pencil.

---

**Prediction Topography Map**:




















---

9.  Add the following information to your map above:
    - ❏ With a red colored pencil/pen label the highest point with a "H"
    - ❏ With a red colored pencil/pen label the lowest point with an "L"
    - ❏ With a blue colored pencil/pen draw arrows where you predict water to flow (Rivers/Streams) Arrows should point in the direction you expect the water to flow.
    - ❏ With a blue colored pencil/pen draw circles where you think the water will form puddles (Lakes, bodies of water)

10. Get your topographic model checked by the Teacher: _____

# Building a Watershed Model
## Day Two

**Procedure**:

1. Obtain a spray bottle from your teacher. Holding it 5 inches above the plastic bag, spray for a few minutes until you see a continuous flow of water in your model. This is your model "Run".

2. Take turns running the model. Each group member should begin his or her turn by spraying the model in a different place.

3. Draw another topography map in the box below labeled "observations". Draw what you observed during the model runs. Use arrows to show where the water flowed and circles to show where puddles formed.

**Observations:**

**Questions**:

*Answer the following questions in complete sentences.*

1. In your own words, define the term watershed. (Do not use the definition from your ISN)

2. What do all watershed boundaries have in common?

3. How can there be two watershed right next to each other?

4. Describe what you observe about the way water flowed over the surface of your model.



5. What type of land cover do you think most closely matches this kind of surface? Why?



6. Did the arrows you drew in your predictions match where the water actually flowed?



7. In your model, what determined where the water flowed? (Think landforms)



8. What is a model?



9. What is the purpose of building a model?



10. What changes in the land could be made to slow the flow of water into the rivers and streams?



11. What changes in the land could be made to increase the flow of water into the rivers and streams?

# Watersheds- How to Find them

## What is a Watershed?

A **watershed** is an area where all rainfall collects into a common location. The common location could be a stream, a pond, a river, etc. How do we find the boundaries of the watershed? Edges of a watershed are usually found in the highest areas around. There, water falling as rain on one side of the mountain or hill runs down into one watershed while water falling on the other side of the mountain or hill runs down into another watershed.
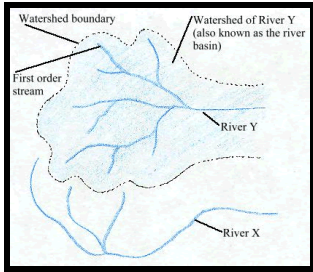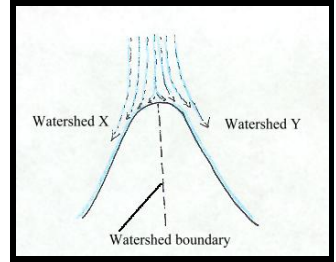




## Finding Watershed Boundaries

Finding watershed boundaries for a creek on a topo map is as simple as finding the highest points around the creek and connecting the dots. Starting at the creek, go uphill in every direction (except directly downstream) until you reach the highest points. Sometimes the highest point above the creek may be a peak, shown as a closed circle. Other times, the highest point is a ridge, shown as an elongated U- shape. In any case, on the other side of these highest points, a new watershed begins. Connect the highest points around the creek with a line and you have drawn in the watershed boundary.
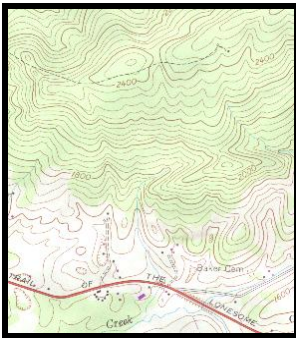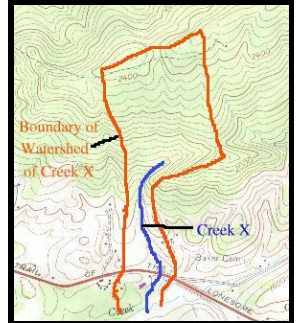


## Let's Find a Watershed!

Suppose we are thinking of building a new apartment building in the area. Before we can start, we need to take a look at the local watershed! The first step in determining your construction site's watershed boundaries is to mark the location of all of the wet and dry creeks around your construction site. For example, I've marked the drainage patterns onto the topo map on the right as blue lines. (The topo map on the left is the original, unmarked topo map.) The proposed construction site is shown as a red rectangle.
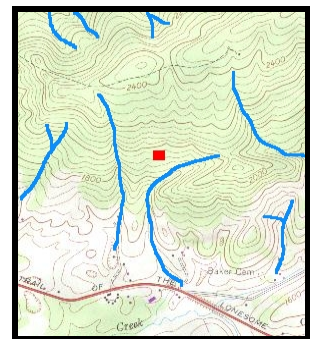




Next, you need to determine the watershed boundaries between the creeks as explained in the last section. I have marked all of the watershed boundaries onto the map above as red lines. Once your watershed boundaries are marked onto the map, it will become clear which creek or creeks the water from your construction site will flow into. I have marked with an X the creek and the location in the creek which water from the construction site will flow into.

The final step is to mark the lower boundaries of the watershed.  The X marks the lower boundary of the construction site's watershed, so I have marked the construction site's watershed boundaries in orange

.



## Assignment

You plan to build a subdivision in the area marked in red on the map below.  Draw the watershed boundary of this area onto your topo map.
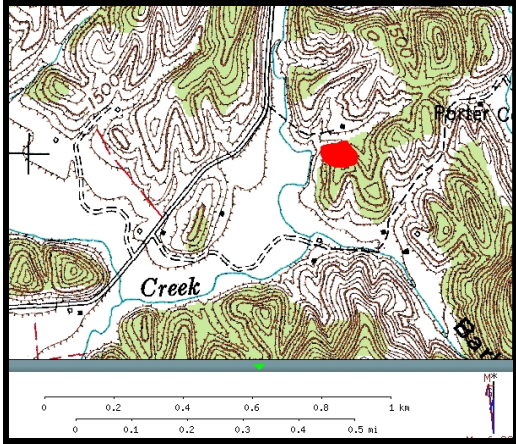
## Chapter 14     **Watershed Boundaries**

**Problem** *How do you define the boundaries of a watershed?*

## Background

### Why Watersheds?
Not all of the water that flows out of the mouth of a river started at its source. Tributaries, surface runoff, and even some groundwater contribute to a river's flow. Along the way, this water can pick up pollutants and concentrate them in the river. Because of this, ecologists studying river systems often want to consider pollution sources from the entire watershed—the area of land that drains into a river system.

### Water Runs Downhill
To define watershed boundaries, scientists start with the fact that water always runs downhill. Consider a raindrop that falls on one side of a mountain. It will flow down the side it fell on, not run up and over the mountain's peak. Because of this, the boundaries of a watershed are formed by high points, like mountain peaks and ridges. A ridge is a narrow stretch of high land with a slope on either side.

Ecologists identify watershed boundaries by reading topographical maps. Topographical maps show the elevation, or height above sea level, of landforms by using contour lines. A contour line connects points on the land that occur at the same elevation. Contour lines help you see the rise and fall of three-dimensional landforms on a flat two-dimensional piece of paper. For example, the images below show a side view, and a topographic representation of the same mountain.

Name _____ Class _____ Date _____
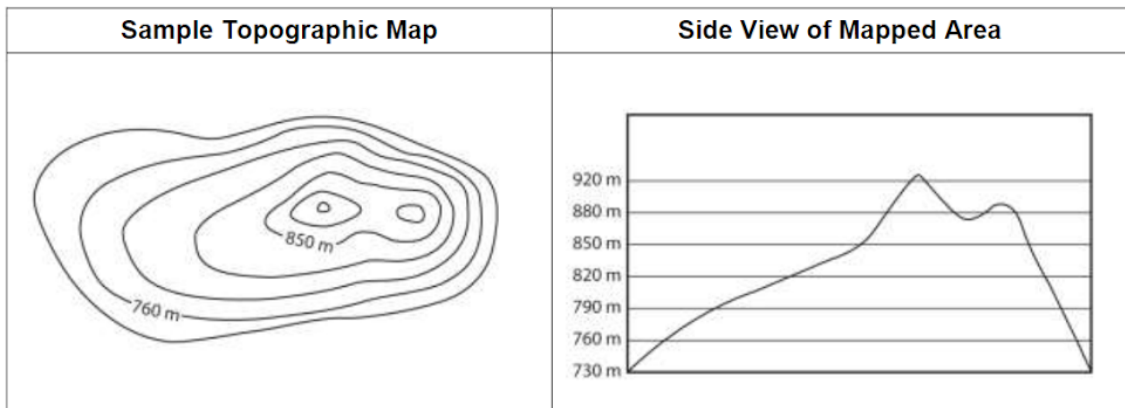
## 🗲 Build Map Skills

**Read a Topographical Map**  To mark a watershed boundary, you need to know how to read a topographical map. Like some maps, a topographical map looks down from above, but unlike other maps, topographical maps show the rise and fall of the landscape. The topographical map below shows two small peaks connected by a ridge line.
- Contour lines connect areas of the same elevation.
- Contour lines are drawn at the same interval of elevation change.
- On this map, the contour interval is 30 meters.
- In an area where contour lines bunch together, the is the change in elevation is steep.
- At places where the contour lines spread out, the rise or drop occurs more gradually.

1. Beside the map, draw a quick sketch of the mountain, seen from a side view.

2. What is the lowest elevation shown on the map? _____

3. What is the highest elevation? _____

4. Draw a line connecting the two peaks on the map, running along the highest point of land between each.

5. Circle the area with the steepest change in elevation.



**Anypeak Mountain**

2

130

Name _____ Class _____ Date _____
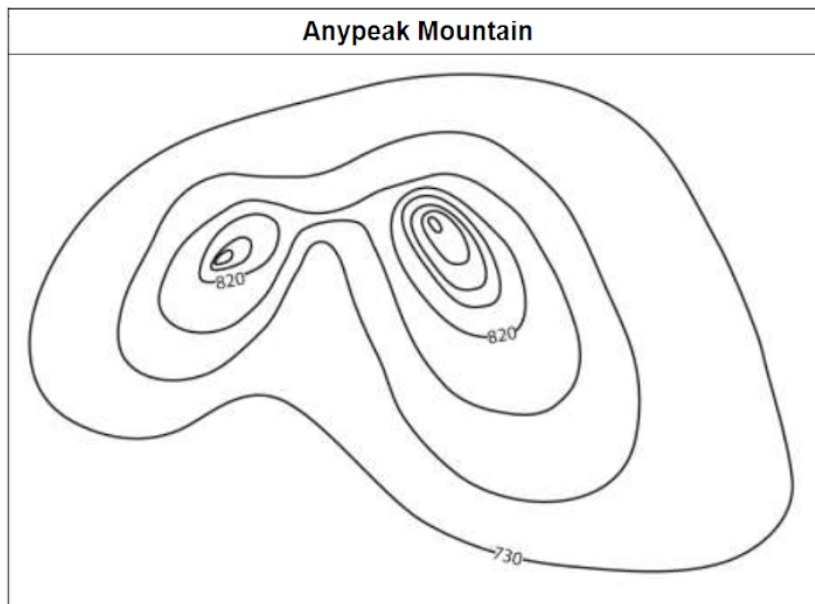
## Procedure

**Step 1**    Study the topographical map of the area around Anywater River.

**Step 2**    Use a pencil to locate, label, and trace Anywater River on the map.

**Step 3**    Find and mark with X's all peaks or high points surrounding the river.

**Step 4**    Draw a continuous boundary connecting the peaks and running along the ridges, the highest elevations that connect the peaks. To do this, cross elevation lines at right angles. Be sure your line does not cross the river. This boundary defines the watershed of the Anywater River.

**Step 5**    Lightly shade the area within your boundary line.

**Step 6**    Mark arrows ( > ) along the river to show the direction of the river's flow.

6.   Use the map below to identify and mark the Anywater River Watershed.



**Anywater River Watershed**

River · — · · —

1 cm = .5 km

Name _____ Class _____ Date _____
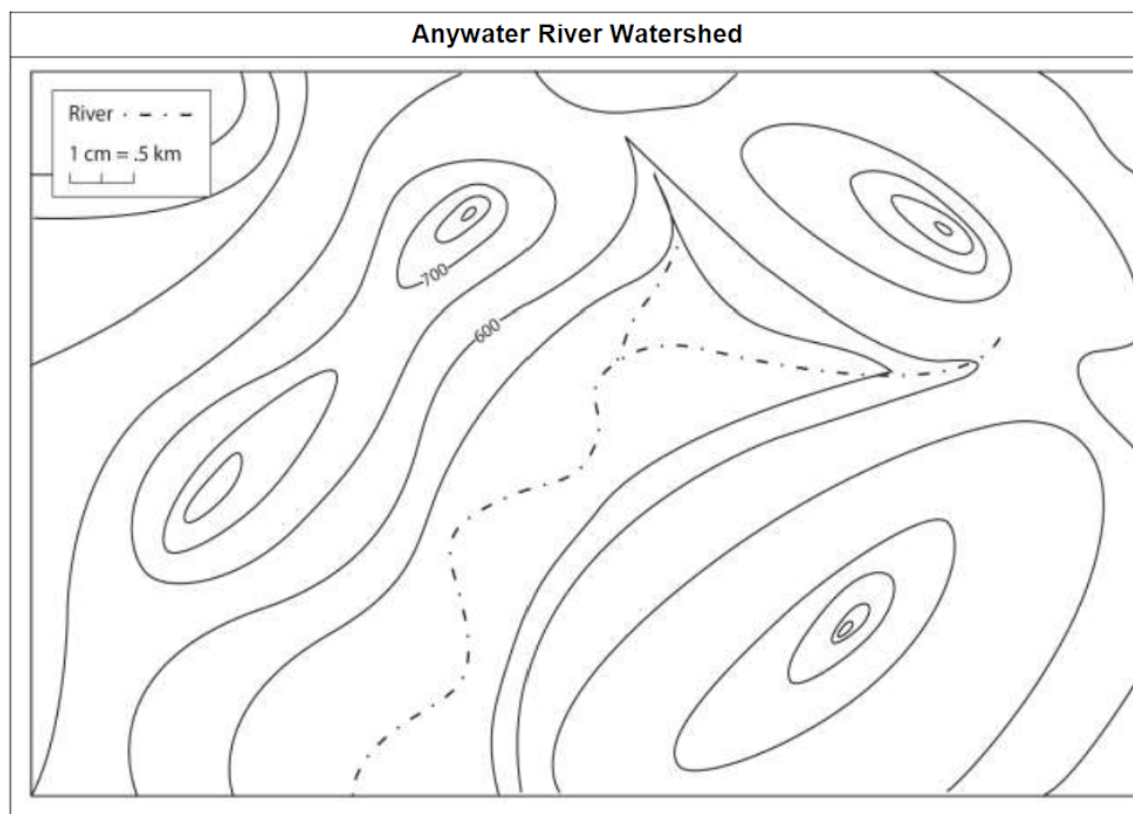
## Analyze and Conclude

7. **Apply Concepts**  Why did marking the high elevation points determine the watershed's edge?

_____

_____

_____

_____

8. **Explain**  How did you know which direction to mark the arrows to show water flow?

_____

_____

9. **Draw Conclusions**  Why are dry land areas—not just waterways and wetlands—included in a watershed?

_____

_____

_____

_____

10. **Infer**  Why is a topographical map—not just a map showing land and water boundaries—necessary for defining a watershed boundary?

_____

_____

_____

_____

11. **Extension**  Why would an ecologist monitoring the water quality of the river want to know about the types of pesticides and fertilizer used by farms in the area?

_____

_____

_____

_____

**4**

**Pollution Notes**

Video: https://www.youtube.com/watch?v=XFpCgjb29sM&t=7s

Today you will be creating your own notes on classifying pollution (page ____). Watch the videos above with your partner and create your own ISN notes page. **Remember to use color**! Be creative!

Information I would include:
Definitions:
- Pollution
- Point Source Pollution
- Non Point Source Pollution

Other:
- Examples  of Air, Water and Land pollution (Choose 1 of each)
- Examples of Point source pollution with picture
- Examples of Non-Point Source pollution with picture.

## Water Pollution Project

1. **Objective**: Students will create a poster presentation in groups of 3-4  students which will describe one type of water pollution. The presentation should include images and information.  The presentation should also display attention-grabbing captions and titles.
2. The types of pollution we will look at are as follows:
   A. Sediments
   B. Petroleum products
   C. Mercury
   D. Acid Rain
   E. Phosphorus
   F. Nitrogen
   G. DDT
   H. PCB
   I. Heated water
   J. Animal waste

Presentation should include:
1. Creative title for your presentation.
2. Pictures of your pollution incident, printed or hand drawn.
3. The following information is included in your presentation:
   - Explanation and definition of your type of pollution. How does this type of pollution occur?
   - At least 3 locations where this pollution can be found (look for places in Illinois first then the rest of the country and finally outside of the country). What is the primary source of this pollution?
   - For your pollution type, in Illinois, how does this pollution affect the local economy? The local ecosystem? What concerns are there about this pollution?
   - Effects of this pollution on human health
   - Effects of this pollution on animal health
   - What is a possible solution to this pollution type? What are the proposed plans to clean up the polluted Illinois site? What are the pros and cons to cleaning up this pollution?
4. You will present your presentation to the class.  Be prepared to explain in depth your pollution incident and your solution or possible solution for preventing further destruction and/or harm.
5. Proper grammar, spelling, and punctuation.

The presentation should catch people's attention and share the plight and negative effects of water pollution on our Earth.

Your group members will need to work collaboratively and cooperatively. Equal participation and effort from all students should be evident.

Water Pollution Rubric:

| Names | | | | | |
|---|---|---|---|---|---|
| **Pollution Rubric** | **1 - Poor** | **2 - Fair** | **3 - Average** | **4 - Moderately Strong** | **5 - Strong** |
| **The poster contains appropriate items, facts and information. All items of importance on the poster are clearly labeled with labels that can be easily read. The PowerPoint is clean and neat, and the information on it is well organized.** | | | | | |
| **The poster is colorful, creative, interesting, engaging, visually stimulating, and aesthetically appealing use of color, diagrams, text and other materials.** | | | | | |
| **The spelling, punctuation, and grammar of any text is accurate.** | | | | | |
| **Any image is appropriate to the topic.** | | | | | |
| **Information is appropriate to the topic.** | | | | | |
| **The presentation shows an understanding of the topic.** | | | | | |
| **The oral presentation is clear, loud, and proper eye contact is maintained. The student shows familiarity with the content and is energetic and enthusiastic.** | | | | | |
| **TOTAL Points** | **/35** | | | | |

\* You will also receive a group participation grade\*

# Point and Nonpoint Source Pollution ID

Study the picture below and then circle 5 different sources of water pollution (Note: you must choose at least one point and non-point source of pollution). Below the picture list each pollution source, tell whether it's a point or non-point source of pollution and then provide a possible solution to eliminate or reduce the pollution.



1.

2.

3.

4.

5.

Name: _____ Date: _____ Teacher/Class: _____

# How do pollutants impact our water systems?
## Water Pollution Lab

1. What is pollution?


2. What is the difference between point source and nonpoint source pollution? Give an example for each.

| Non-Point Source: | Point Source Pollution: |
|---|---|
| Example: | Example |

3. Using the model you have already built, how could we simulate pollution in our watershed? Design an experiment that simulates how pollution travels through a watershed. Make sure that your experiment is written out in easy to follow steps so that any other group could do the same experiment. What materials will you need (easy to find in our classroom)? How will you conduct your experiment? Use the space below to design your experiment.

**Type of Pollution(Circle)**:   Point Source Pollution          Non-Point Source Pollution

**Material Used to Represent Pollution:** _____

| Procedure: | Materials Needed |
|---|---|
| | |

|  |  |
|---|---|
|  |  |

Once you have finished your design, have a teacher check over your design. Once you get the ok, you may run your simulation. _____

## Follow up Questions:

1. Explain how pollution traveled through your watershed model. Be as specific and detailed as possible.

2. When you added your pollution to one of your rivers, what happened when it rained?

3. Is there any place in your model where the pollution did not go or could not get to? Why do you think this is?

4. How can we use this simulation to explain what could happen to our water supply if another part of our watershed began to be polluted.

Name:                    Class:                    HR:                    Date:

# Watershed Quiz

1. A new subdivision is being built 50 miles north of you in your watershed, and the builders are not being very careful with their waste. Brian is concerned that the pollution being created will contaminate the water in his local area. Julia assures him that there is no way pollution can travel that far. Who is right? Explain.

2. What is the difference between point source and non point source pollution?

3. What do all watershed boundaries have in common?

4. How is it possible that two watersheds can exist next to each other?

5. Why is topography important when locating a watershed?

Name:                 Class:                HR:              Date:

# Abiotic vs. Biotic Factors

What is the definition of an abotic factor?

_____

What is the definition of a biotic factor?

_____

Enter the items from the following list into a Venn diagram.  In the center place what contains both biotic and abiotic factors.

| | | | | | |
|---|---|---|---|---|---|
| Whale | Mushroom | Water | Desert | Paper | Glass |
| Temperature | Coral | Sand | Dead Bird | Clouds | Snail |
| Steak | Fungus | Salad | Mold | Grass | Hair |
| Ocean | Decaying Tree | Rock | Dirt | Gold | Plastic |
| Grapes | Oxygen | Tundra | | | |
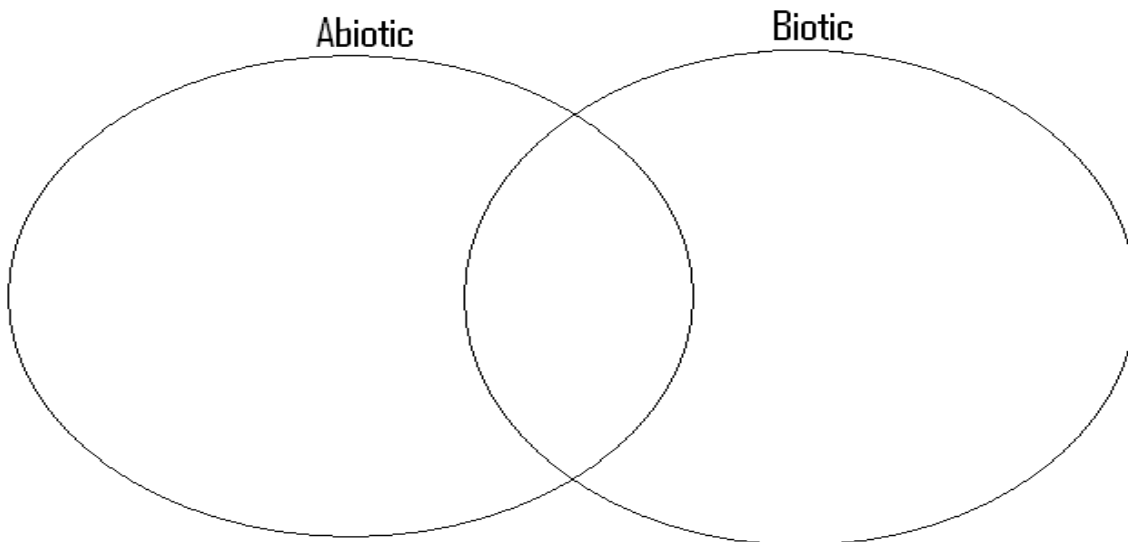
Abiotic                                           Biotic

## Comprehending…

All biotic and abiotic factors are interrelated.  In nature you will find that if one factor is changed or removed, it impacts the availability of other resources within the system.  Knowing this, give an example of what might happen given the following situations.

In the open space place either an (**A) for abiotic** or (**B) for biotic** to identify the **bolded** object.

1. All of the **rocks**(___) are removed from a desert ecosystem, what would happen to the population of rock dwelling **lizards** (___) and in turn the animals which eat them.

   _____
   _____

2. A ten mile area of **trees** (___) is removed from the tropical rainforest.  How will this affect the amount of **water** (___) and the amount of **oxygen** (___) in the area?

_____
_____

## INSTRUCTIONS:
Choose an ecosystem to draw.  In your drawing include the following:
- 10 different biotic factors

- 5 different abiotic factors

Identify all 15 factors and label whether they are **biotic** or **abiotic** factors**.**

- Your picture should make sense.  Ex.) There shouldn't be a polar bear in a sand desert!
- Color your picture
- Be creative!

**Further Analysis:**

Which ecosystem did you choose?_____

Choose one abiotic factor and one biotic factor from your ecosystem.  Imagine that they were suddenly removed.  How would your ecosystem change?

_____

_____

_____

_____

# Pond Life Observation Log

Name: _____

Diagram your organism in the space below and label its physical characteristics. Make sure to include:

- The common name
- Eye (size, color, placement)
- Legs
- Tails (if any)
- Wings (if any)
- Mouth parts
- Body shape
- Distinguishing features

Example:
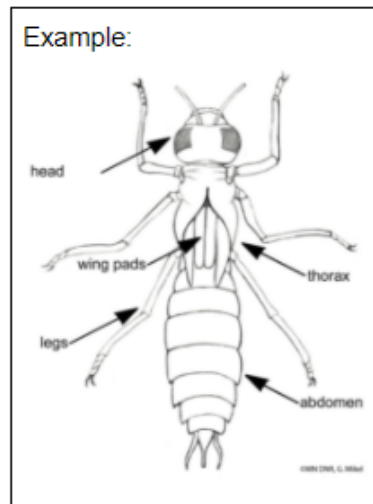


Describe how your creature survives through its habitat, breathing, feeding, movement, its life cycle, and its stress tolerance (function). Include in your description how each feature (its eyes, legs, etc) helps it to survive.

| Habitat: | Movements: | Feeding: |
|---|---|---|
| Breathing: | Life Cycle: | Stress Tolerance (circle one):<br><br>Sensitive<br><br>Somewhat Tolerant<br><br>Very Tolerant |

**Worksheet: Fun With Fictitious Animals**

Directions: Use the following dichotomous key to answer the questions below.

| | | |
|---|---|---|
| **1.** | A. Body covered with hair .................................................. | Go to 2 |
| | B. Body covering is not hair............................................... | Go to 6 |
| **2.** | A. Has four legs ......................................................... | Go to 3 |
| | B. Has more than four legs ............................................... | Go to 4 |
| **3.** | A. Has two heads and two tails ............................... | Double Trouble |
| | B. Has one head and a short, bushy tail ........................ | Grenabar |
| **4.** | A. Has one horn on its head ..................................... | Tamboro |
| | B. Has two horns on head ..................................... | Go to 5 |
| **5.** | A. Has wheels for feet ........................................... | Skateroo |
| | B. Has feet with three sharp claws ........................... | Beezlebub |
| **6.** | A. Body covered with scales ..................................... | Go to 7 |
| | B. Body covered with feathers ................................. | Go to 8 |
| **7.** | A. Has flippers for its six feet and tail ........................ | Nessie |
| | B. Has pincers for its six feet and has a long, forked tail ............. | Marfwheezel |
| **8.** | A. Has beak with no teeth ..................................... | Go to 9 |
| | B. Has mouth with sharp teeth ................................. | Tearitup |
| **9.** | A. Has two antennae and short tongue ........................ | Quib |
| | B. Has four antennae and long tongue ......................... | Ork |

_____ 1. A tamboro is most like a
      A. bird     B. fish     C. mammal     D. reptile

_____ 2. Where would a nessie be most likely to live?
      A. desert     B. ocean     C. forest     D. meadow

_____ 3. How many legs does a beezlebub have?
      A. two     B. three     C. four     D. more than four

_____ 4. What kind of body covering does an ork have?
      A. feathers     B. hair     C. scales     D. none

_____ 5. Which animal is most like a real animal?
      A. double trouble     B. skateroo     C. grenabar     D. ork

_____ 6. What color is a beezlebub?
      A. red     B. brown     C. green     D. cannot tell from key

_____ 7. Which animal is most likely to be able to climb trees?
      A. beezlebub     B. nessie     C. skateroo     D. ork
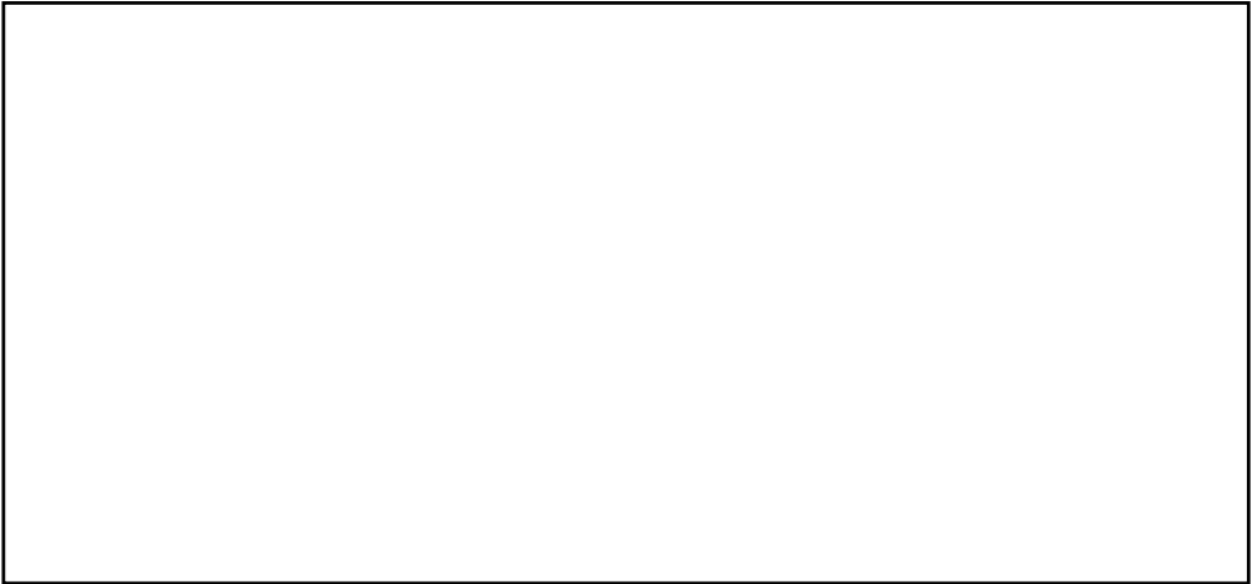
8. List all of the characteristics of a quib.

_____

_____

_____

9. Draw a picture of a skateroo in the box below. Be sure to include all of the characteristics mentioned in the key.

```



```

10. Choose another animal to draw in the box below. Place the name of the organism on the line provided. Again, make sure you include all of the characteristics that are mentioned in the key for that animal.

Name of animal:_____

# Abiotic Water Testing

Before starting your testing, what are some observations you notice about the water? Do you think it is healthy? Explain and be specific.

Below are questions for each one of the tests below. You may do the test in any order you choose (Except Turbidity, Mrs. Jackson will call you by Group).
**You Will Need**:
- Water Test Kit
- Stopwatch
- Writing Utensil

Using the booklet provided, run the following tests. The directions for each test should be followed as the book states.

| Test | Page Number | Prediction | My Result | This Means…. |
|---|---|---|---|---|
| Dissolved Oxygen | pg 22-23 | | | |
| Nitrates | pg 28-29 | | | |
| pH | pg 30-31 | | | |
| Phosphate/ Phosphorus | pg 32-33 | | | |
| Temperature | pg. 36-38 | | | |
| Turbidity | WITH MRS. JACKSON | | | |

In the back of the booklet on pages 41-42 is a **test result ranking**, use this table to compare your results

**TEST NOTES**

| Test | Page Number *Depends on Book you have* | TEST NOTES |
|---|---|---|
| Dissolved Oxygen | pg 22-23 | |
| Nitrates | pg 28-29 | |
| pH | pg 30-31 | |
| Phosphate/ Phosphorus | pg 32-33 | |
| Temperature | pg. 36-38 | |
| Turbidity | WITH MRS. JACKSON<br><br>Take notes on results | |

## Macroinvertebrate Bioindicator Lab Write up

- With your table, you will create a bioindicator water quality slide show. Your slides should include the following information:
    - What is the name of the Lake or Pond that you explored?
    - Before analyzing the macroinvertebrates, what did you assume about the quality of the water? What led you to that decision? What did the water look like? What did you see that indicated good or bad quality?
    - What were the different macroinvertebrates you found in the Lake or Pond? What can they tell you about water quality as individuals? Make sure to include some pictures! How do benthic macroinvertebrates help us assess water quality?
    - Based upon the all macroinvertebrates you found, what does that tell you about the water quality? Good, Fair, Poor? Why?
- Go through your slide show.
    - Is it neat? Colorful? Well organized?
    - Is everything easy to read?
    - Are there pictures that enhance what you are talking about?
    - Have all the questions been answered?
    - Did you group do the best possible job?
- Share your finalized slideshow with Mrs. Jackson hjackson@pccharterschool.org

## Abiotic Factors Lab Write-Up

- With your table, you will add to your biotic water quality slide show. It will now become a water quality slideshow! New slides should be added and should include the following information:
    - What abiotic tests did you run? Why are they important?
    - What were the results of all of your tests?
    - What do your results mean for the quality of the lake?
    - What are some of the possible errors that you could have made while abiotic testing?
    - Based upon the information you have gathered (both biotic and abiotic), what is the water quality of your lake?
    - What evidence do you have to support your claim?
- Go through your slide show.
    - Is it neat? Colorful? Well organized?
    - Would any teacher be able to go through and understand what you have written? Is there anything you should go back and define or change?
    - Is everything easy to read? Can you take several steps back and still read your text?
    - Are there pictures that **enhance** what you are talking about?
    - Have all the questions been answered?
    - Did you group do the best possible job? Is your slideshow the best one in the room?
- Share your finalized slideshow with Mrs. Jackson hjackson@pccharterschool.org

**Water Quality Slideshow**      Class:                    Group Members:

| Basics  /5 | Biotic Factors  /5 | Abiotic Factors  /5 | Conclusion  /5 | Presentation Skills  /5 |
|---|---|---|---|---|
| ❑ Name of Lake or Pond is obvious<br>❑ Predictions given about water quality before analyzing- explained what they saw that indicated good or bad quality<br>❑ Presentation is colorful, neat, and well organized.<br>❑ Any teacher could go through the presentation and understand what is written.<br>❑ Presentation is easy to read - large paragraphs are not used<br>❑ Pictures are used to enhance presentation | ❑ Explained several different macroinvertebrates that were found.<br>❑ Pictures of macroinvertebrates included<br>❑ Explained how (benthic) macroinvertebrates can help to assess water quality.<br>❑ Based upon the all macroinvertebrates you found, what does that tell you about the water quality? Good, Fair, Poor? Why? | ❑ Explained what abiotic tests were run and why they are important<br>❑ Explained the results of the tests and what those results mean<br>❑ Explained what abiotic tests were run and why they are important<br><br>❑ Dissolved Oxygen<br>❑ Nitrates<br>❑ Phosphorus<br>❑ Turbidity<br>❑ Temperature<br>❑ pH | ❑ Explained some possible errors that could have been made while testing.<br>❑ Used both abiotic and biotic testing to come up with a conclusion about the water quality of the lake.<br>❑ Used evidence to support their water quality claim. | ❑ All group members were part of the presentations<br>❑ It appears that all group members did an equal share of the work<br>❑ Students used their in class time wisely to prepare slideshow<br>❑ Proper eye contact is maintained<br>❑ Students don't read off slideshow- may reference notecards<br>❑ Obvious that information has been rehearsed.<br>❑ Presentation is 3-5 minutes long |

Presentation Notes:

8th Grade ELA Unit of Study

ELA 8: Holocaust Book Groups unit plan

| Essential questions | |
|---|---|
| ● Why is it so important to remember and tell the stories of a genocide like the Holocaust? <br> ● What could have prevented these crimes from taking place? Why is the choice of indifference so dangerous? <br> ● What are the benefits of primary sources, and of secondary sources? What are some shortcomings? Why must we be critical thinkers when reading? | |
| **Primary skills taught:** <br> ● Reading nonfiction <br> ● Annotating <br> ● Summarizing for comprehension in complex texts <br> ● Advantages and disadvantages of primary and secondary sources <br> ● Analyzing advantages and disadvantages of different media to present a topic (textbook, fiction, news article, memoir, diary, graphic novel, online web exhibit, video) <br> ● Foreign words in texts <br> ● How to read a graphic novel (visual literacy) <br> ● CCSS Speech and Language discussion skills <br> ● Writing discussion questions | **Standards covered** <br> RI: 8.1, 8.2, 8.4, 8.6, **8.7**, 8.9 <br> RL: 8.1, 8.4 <br> W 8.1, 8.4 <br> S&L: **8.1,** 8.2, 8.6 |
| **Assessment** <br> ● Cold read test/writing <br> ● Collect notebooks with discussion preparation <br> ● Evaluate fishbowl discussion for meeting 3 | **Assessment:** Cold-read excerpt from *Hiroshima* and *World History: Patterns of Interaction*. Short essay: Contrast what you learn from the two texts. Consider audience and purpose, primary/secondary source. |
| Texts | |
| **Anchor:** (Book groups: students choose one) <br> ● *Maus I and II* by Art Spiegelman*,* <br> ● *Anne Frank: Diary of a Young Girl* by Anne Frank <br> ● *Night* by Elie Weisel <br> ● Available: *Boy in the Striped Pajamas* and *Number the Stars* if needed. (5/6 | **Notes:** <br> **Maus I** Guided Reading: Y <br> **Anne Frank** Lexile: 1080, guided reading: Y <br> **Night** Lexile: 570, guided reading: Z |

| | |
|---|---|
| reading level) **Related texts:** <br> ● Excerpt from *The Book Thief* <br> ● "Auschwitz shifts from memorializing to teaching" New YorkTimes <br> ● "The Final Solution" excerpt from *World History: Patterns of Interaction* (McDougal Littell) [textbook] <br> ● Anne Frank house exhibit [web] <br> ● "Return to Auschwitz" (Elie Wiesel and Oprah Winfrey) [video] <br> ● Excerpts from *MetaMaus* <br> ● "What is genocide," background on Rwanda from the U.S. Holocaust Museum <br> ● Also available: Elie Wiesel's Nobel acceptance speech, "The Girl Who Lived Forever" (pdf, Scholastic Scope), "It's Raining on the House of Anne Frank" poem (CommonLit) | **Useful resources:** <br> US Holocaust Museum <br> Facing History and Ourselves <br> Match Fishtank Unit |

| Teaching sequence | |
|---|---|
| 1. Introduce three text options. Let students review and rank their choices. Assign students to book. <br> ● Introduce Book Group Expectations sheet and set reading due dates. Three meetings, roughly ⅓ each time, about 1 week apart. <br> ● KWL activity for Holocaust. | 5-7 students works well. Four only if all will pull their weight. <br><br> Anne Frank is longer. Plan for extra days for reading. <br><br> Students will need a fair amount of extra class time to read and prepare for book groups. At least 2x week, full or partial days. **Skill review: writing discussion questions** |
| 2. How to annotate <br> ● Introduction to annotating slideshow and worksheet <br> ● Practice annotating textbook excerpt (Holocaust background) <br> ● Write a summary of the steps leading up to the "final solution." | Annotating slideshare/notes <br> **Skill: annotating textbook** excerpt using those ideas. <br> **Skill review: Write a summary** of the steps to the Final Solution. |
| 3. Read/annotate/discuss Book Thief, Auschwitz article (NY Times paired texts activity) <br> ● Read/annotate excerpt from *The Book Thief* | **Skill: annotating fiction**. Model. Compare. Discuss questions/thoughts raised while annotating. In book groups, discuss questions from paired reading. <br> **Skill Review: Reading for a purpose** |

| | |
|---|---|
| ● Read/annotate Auschwitz museum article<br>● In small groups, discuss questions related to the paired texts. | |
| 4. First book meeting: Review expectations, procedures. In groups, assign roles. After meeting, be ready to discuss focus question with whole class:<br>● How much did the people in your book understand what was happening in this section?<br>● Did anyone help them?<br>● Question that generated best discussion. | **Skill: Discussions** |
| 5. Primary and secondary sources:<br>What can different types of narratives offer in terms of our understanding?<br>Define primary and secondary sources.<br>In groups, brainstorm or sort primary/secondary sources. Define terms.<br>Discussion: What are advantages and disadvantages of each? Record information on graphic organizer in notebook. | Compare the knowledge and understandings gained from different media. **Skill: primary/secondary texts** |
| 6. Language:<br>● Context clues (all). Practice identifying clues in text that can help readers figure out unfamiliar vocabulary. (Regular and challenge-level activities)<br>● Understanding foreign words and phrases and their impact on tone. (enrichment) | **Skill: Context clues** |
| 7. Second book meeting: Review expectations, procedures. After meeting, be ready to discuss focus question with whole class:<br>● What can you learn about this historical event from this book? What can you not really know? | |
| 8-10 Book explorations: (typically one a week between book meetings; video usually last activity in unit.)<br>● Virtual field trip to the Secret Annex | Students will learn about the issues raised in the other texts, or deepen their understanding of the text they are reading. |

| | |
|---|---|
| online (worksheet) [Students who aren't reading the diary can read Scholastic Scope article for overview while AnneF group has a book meeting]<br>● *Maus* as a Graphic Novel interactive slideshows. **Skill: visual storytelling**<br>● [Return to Auschwitz](#) video (reflection-related to essential questions.) | Compare the knowledge and understandings gained from different media. **Skill: primary/secondary texts** |
| 11. Third book meeting: Done as fishbowl discussion. Each group discusses their prepared questions and passages. Rest of class observes, evaluates strengths of discussion. | |
| 12. Assessing and defining genocide<br>● Read "What is genocide," consider legal definition of the term, evaluate historical events.<br>● Read background on Rwanda and annotate. Individually, fill out Deciding Where Responsibility Lies worksheet, followed by small group discussion. | Considering genocide and individual responsibility<br><br>Texts and activities adapted from the U.S. Holocaust Museum website |
| 13. Formal assessment: Reading nonfiction test. (Regular and modified versions). Students will demonstrate annotation skills, context clues, general comprehension of nonfiction historical texts, primary and secondary source analysis (short essay). | |
| 14. Optional extensions:<br>● Interviewing family members to create oral histories.<br>● Visit to Illinois Holocaust Museum | Guidelines from NPR's StoryCorps: Great Thanksgiving Listen project link |

# Graphs & Questions

What to do when you first look at a graph?

# What's going on in these graphs?

1.  What do you notice?
2.  What does each axis measure?
3.  Do you notice any color-coding, symbols, or labels? If so, what do they mean?
4.  Do you see any patterns?
5.  What do you think is going on in this graph?
6.  What does this make you want to know more about?

## Directions

- Find the graph for your breakout room.
- Take a silent moment to look at the graph.
- Talk about the graph using the questions. Try to tell a story about what the graph is showing.

# BREAKOUT GROUP #1



Bus ridership in Miami, Minneapolis, Atlanta and Portland, Ore.
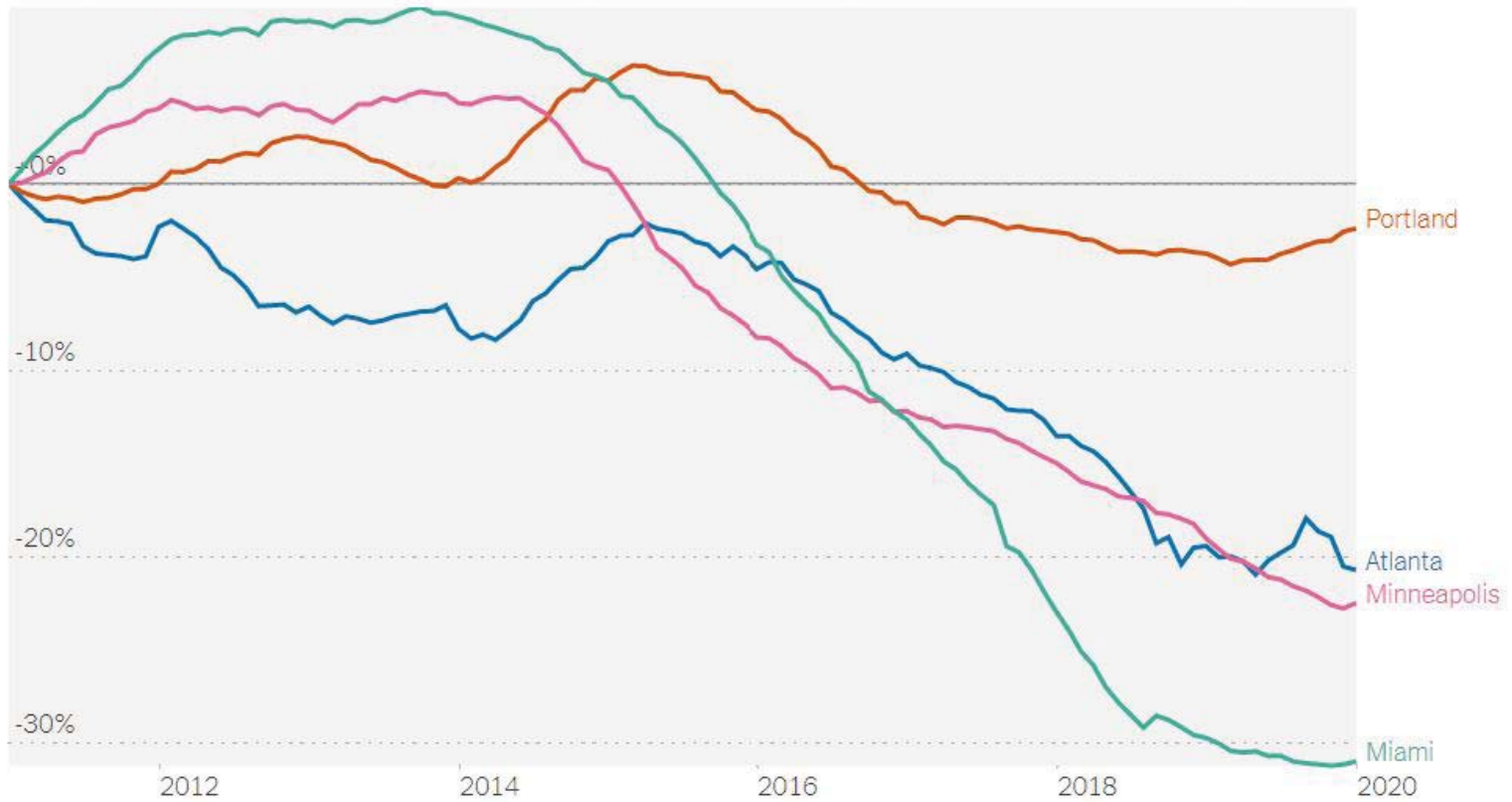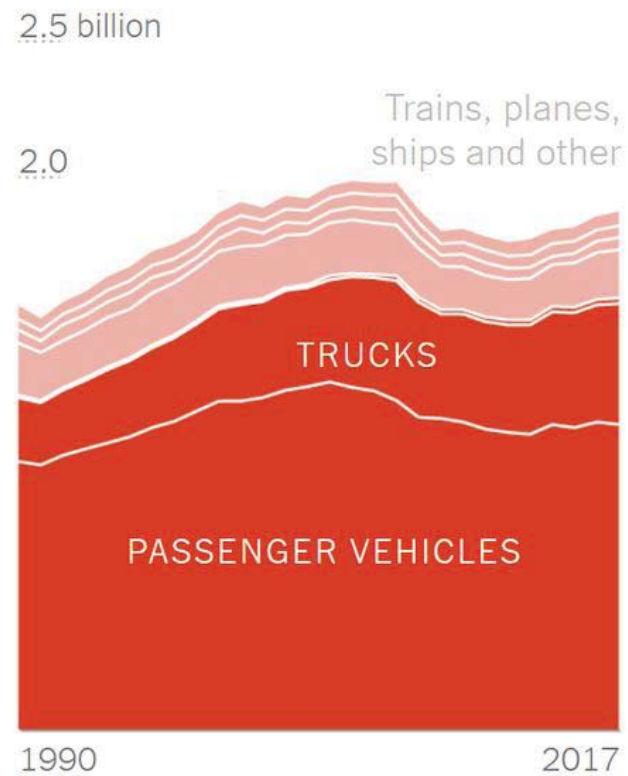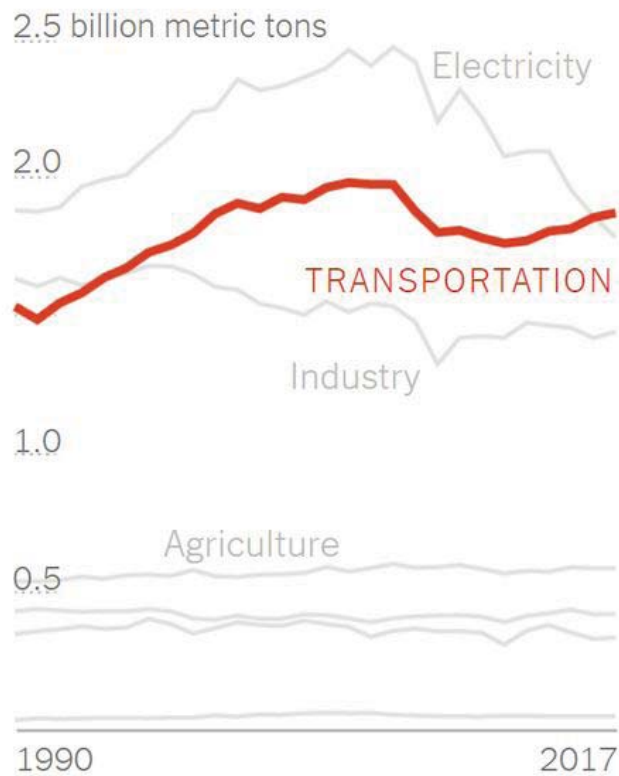
# BREAKOUT GROUP #2

What percentage of teenagers see problems like anxiety, bullying, drug addiction and gangs as either major or minor among their peers?

| | Major | Minor | Not |
|---|---|---|---|
| Anxiety & depression | 70% | 26 | 4 |
| Bullying | 55 | 35 | 10 |
| Drug addiction | 51 | 35 | 13 |
| Drinking alcohol | 45 | 39 | 16 |
| Poverty | 40 | 47 | 13 |
| Teen pregnancy | 34 | 44 | 21 |
| Gangs | 33 | 38 | 29 |
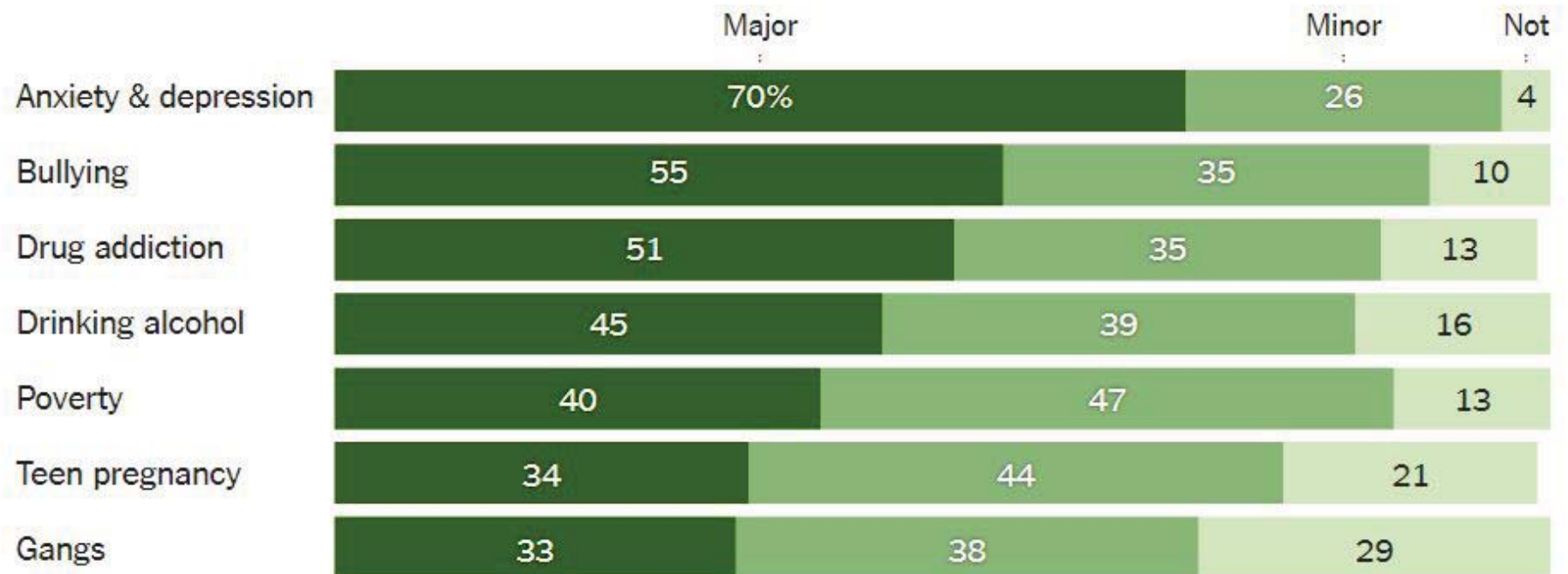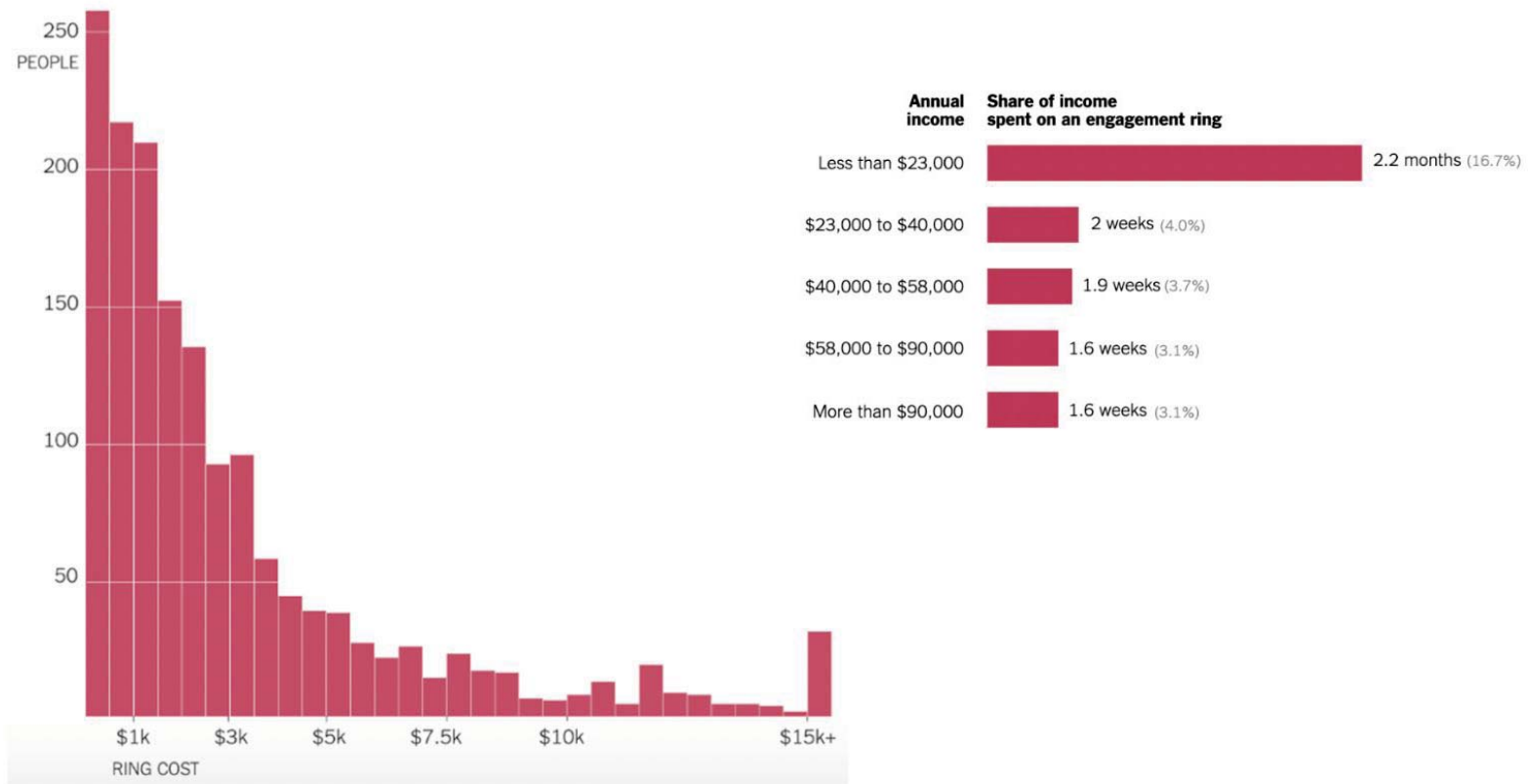
# BREAKOUT GROUP #3



**Top Sources of Greenhouse Gases in the United States**
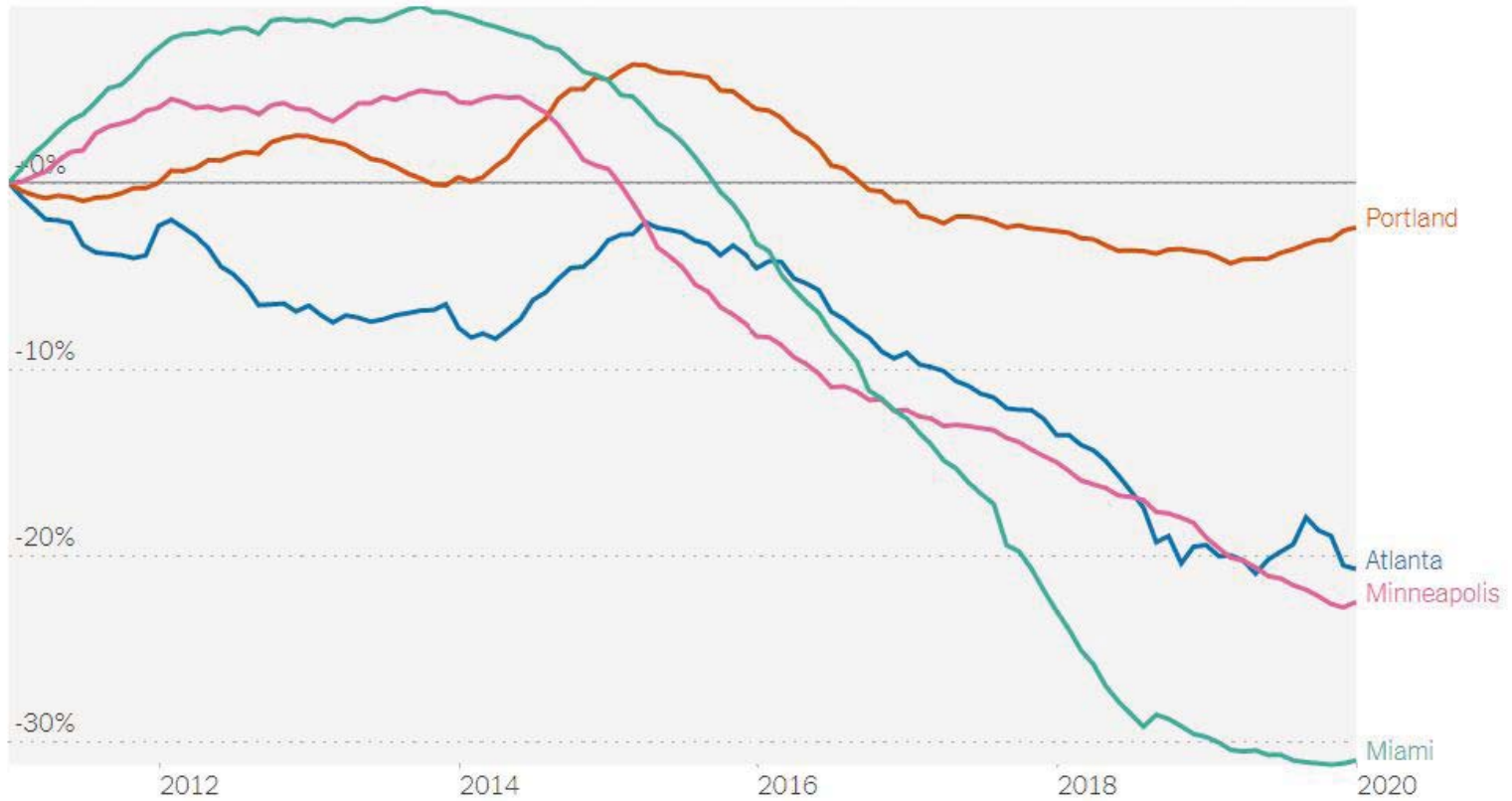
# BREAKOUT GROUP #4

How much do people spend on engagement rings?

# BREAKOUT GROUP #5
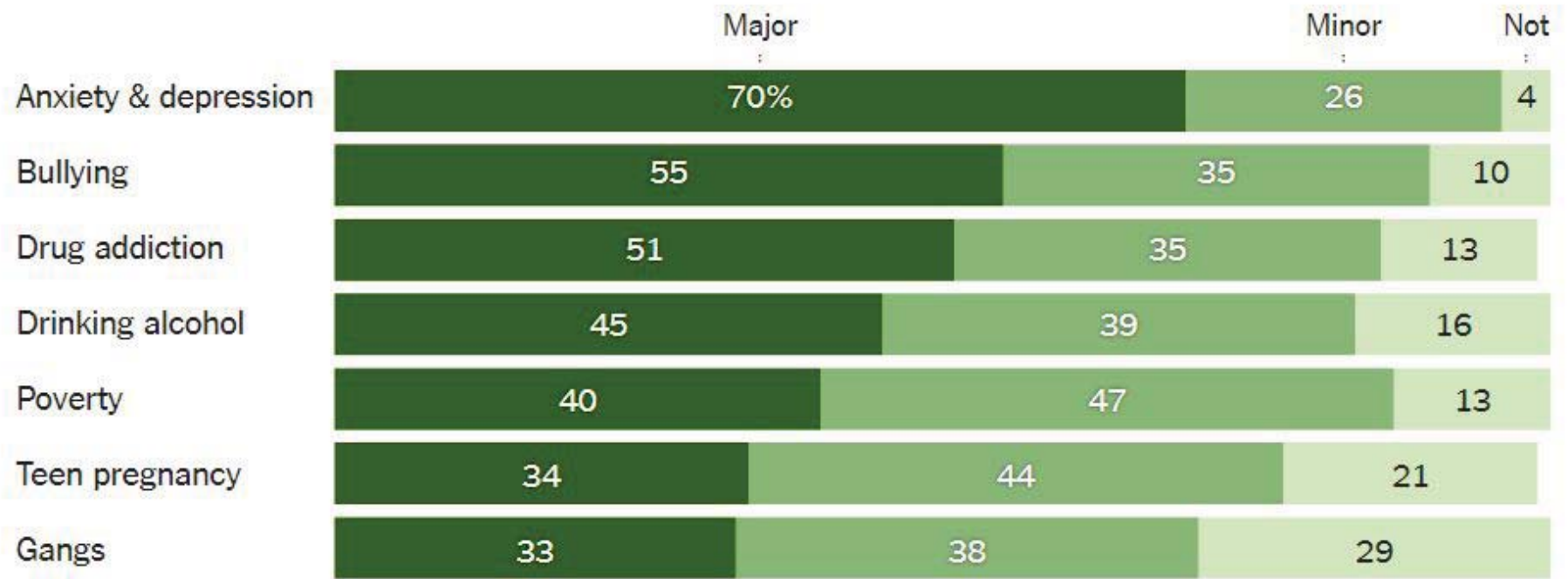


**Bus ridership in Miami, Minneapolis, Atlanta and Portland, Ore.**
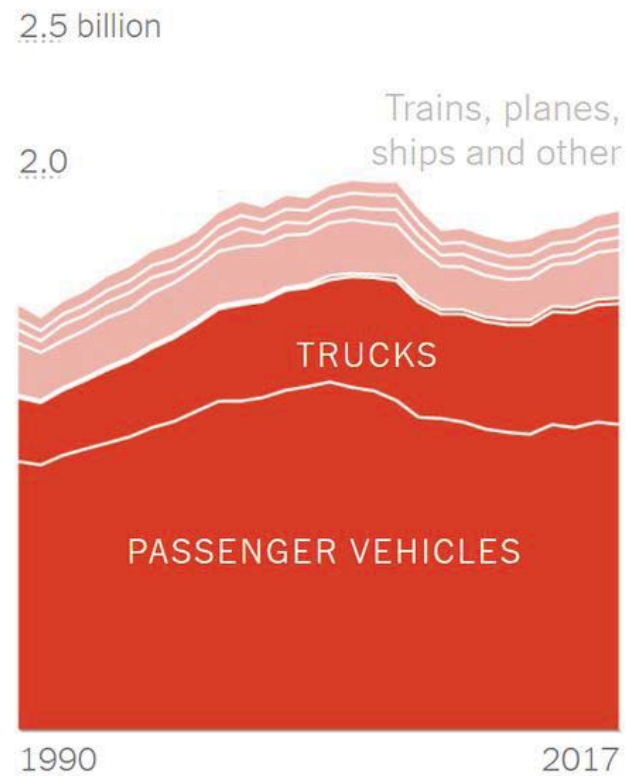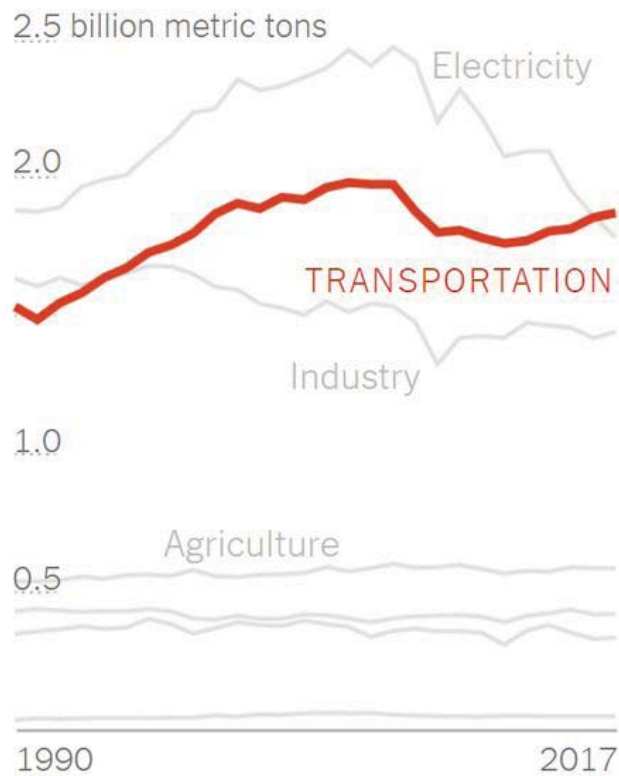
# BREAKOUT GROUP #6

What percentage of teenagers see problems like anxiety, bullying, drug addiction and gangs as either major or minor among their peers?



| | Major | Minor | Not |
|---|---|---|---|
| Anxiety & depression | 70% | 26 | 4 |
| Bullying | 55 | 35 | 10 |
| Drug addiction | 51 | 35 | 13 |
| Drinking alcohol | 45 | 39 | 16 |
| Poverty | 40 | 47 | 13 |
| Teen pregnancy | 34 | 44 | 21 |
| Gangs | 33 | 38 | 29 |

# BREAKOUT GROUP #7



Top Sources of Greenhouse Gases in the United States

# BREAKOUT GROUP #8

How much do people spend on engagement rings?
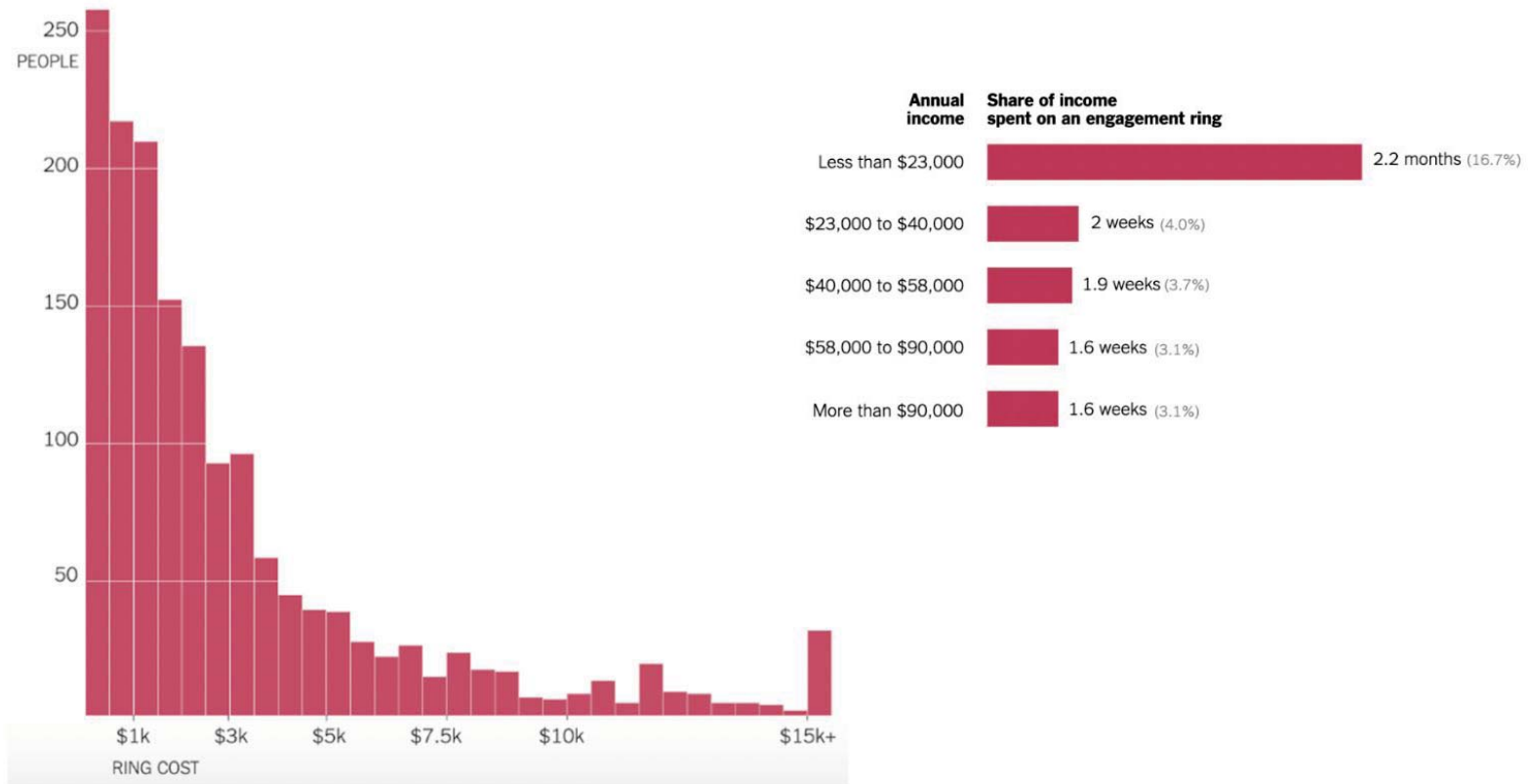
# BREAKOUT GROUP #9

**Bus ridership in Miami, Minneapolis, Atlanta and Portland, Ore.**
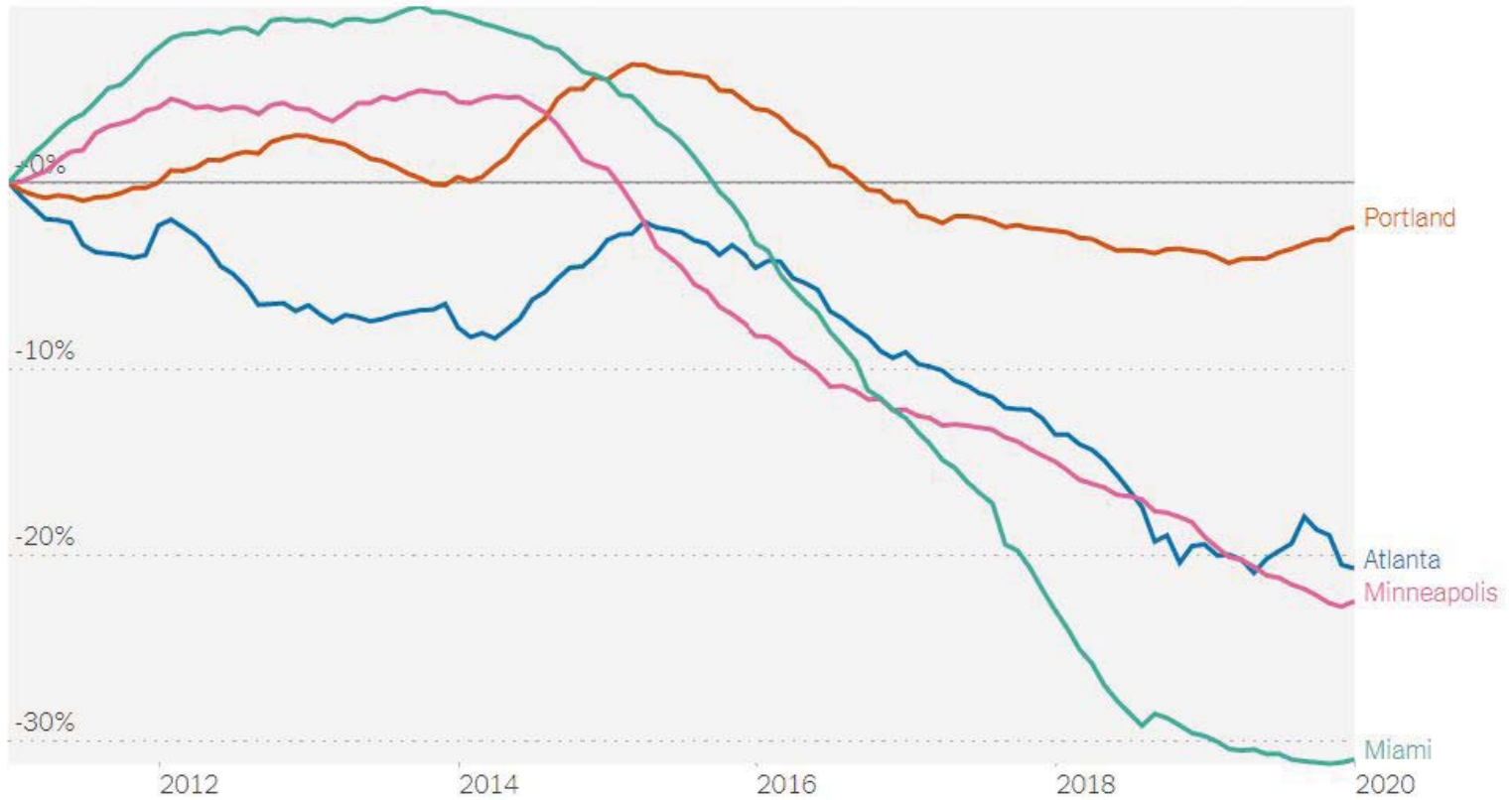
# BREAKOUT GROUP #10

What percentage of teenagers see problems like anxiety, bullying, drug addiction and gangs as either major or minor among their peers?

| | Major | Minor | Not |
|---|---|---|---|
| Anxiety & depression | 70% | 26 | 4 |
| Bullying | 55 | 35 | 10 |
| Drug addiction | 51 | 35 | 13 |
| Drinking alcohol | 45 | 39 | 16 |
| Poverty | 40 | 47 | 13 |
| Teen pregnancy | 34 | 44 | 21 |
| Gangs | 33 | 38 | 29 |
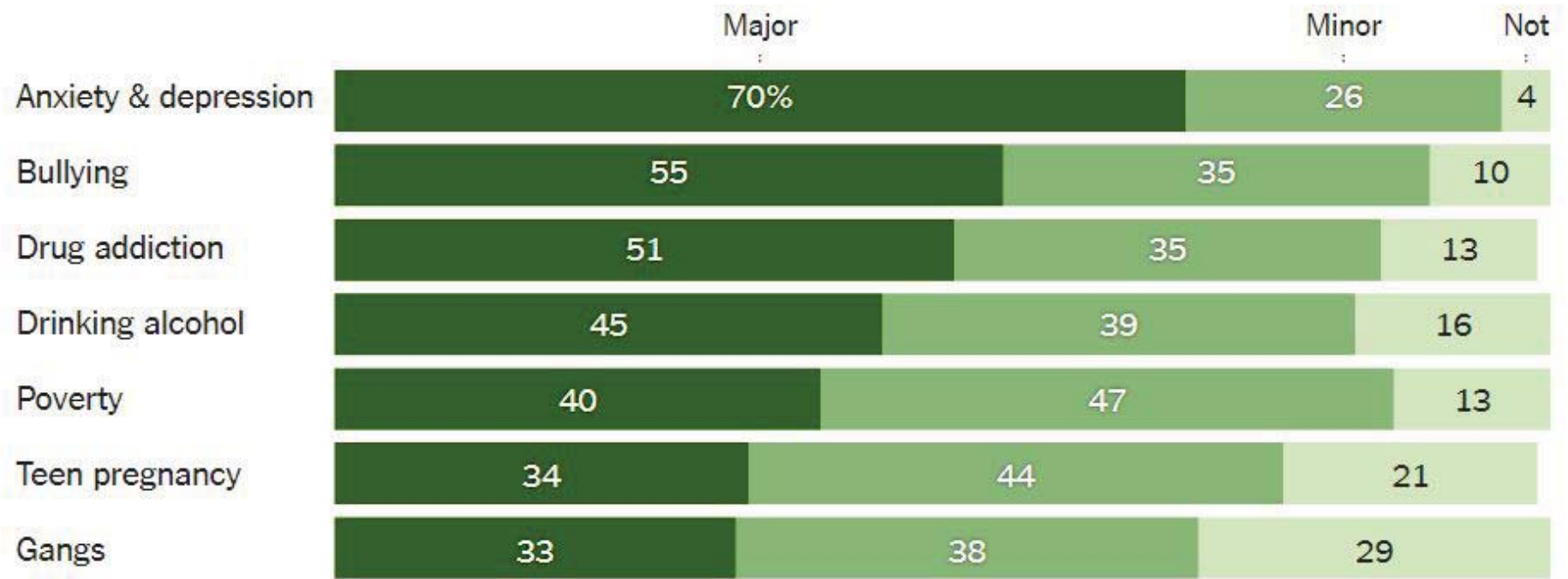
# BREAKOUT GROUP #11



**Top Sources of Greenhouse Gases in the United States**

# BREAKOUT GROUP #12

How much do people spend on engagement rings?

# BREAKOUT GROUP #13



Bus ridership in Miami, Minneapolis, Atlanta and Portland, Ore.

# BREAKOUT GROUP #14

What percentage of teenagers see problems like anxiety, bullying, drug addiction and gangs as either major or minor among their peers?

| | Major | Minor | Not |
|---|---|---|---|
| Anxiety & depression | 70% | 26 | 4 |
| Bullying | 55 | 35 | 10 |
| Drug addiction | 51 | 35 | 13 |
| Drinking alcohol | 45 | 39 | 16 |
| Poverty | 40 | 47 | 13 |
| Teen pregnancy | 34 | 44 | 21 |
| Gangs | 33 | 38 | 29 |

# BREAKOUT GROUP #15



**Top Sources of Greenhouse Gases in the United States**

# BREAKOUT GROUP #16

How much do people spend on engagement rings?
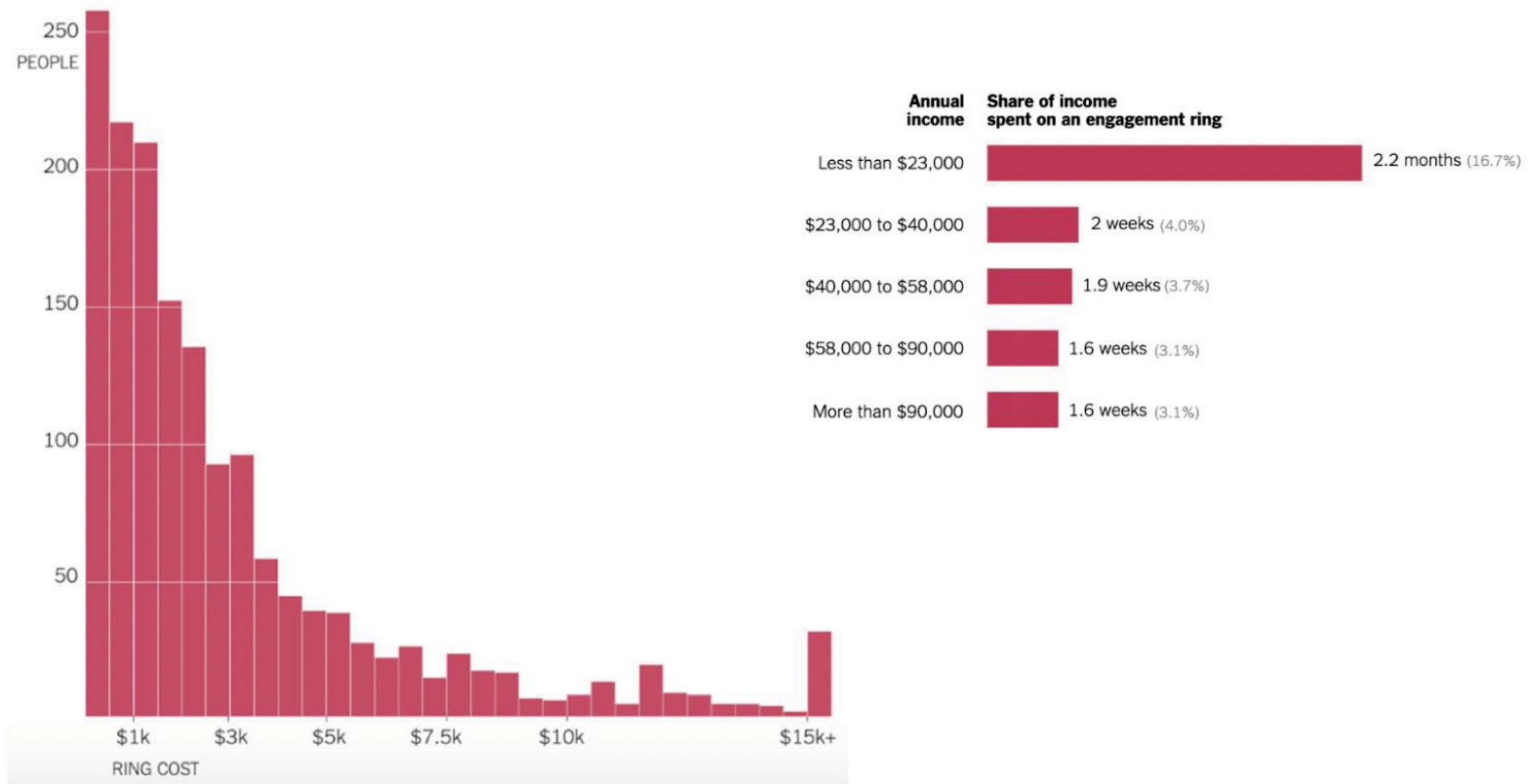
# Isle Royale

Wolf & Moose Activity

# Directions

Drag the pictures that correspond with the events to show WHEN you think they occured

The events are described on the website:
https://sites.google.com/calacademy.org/data2020october/home/wolf-and-moose-activity

Add text boxes to specify years or add any explanation of your reasoning
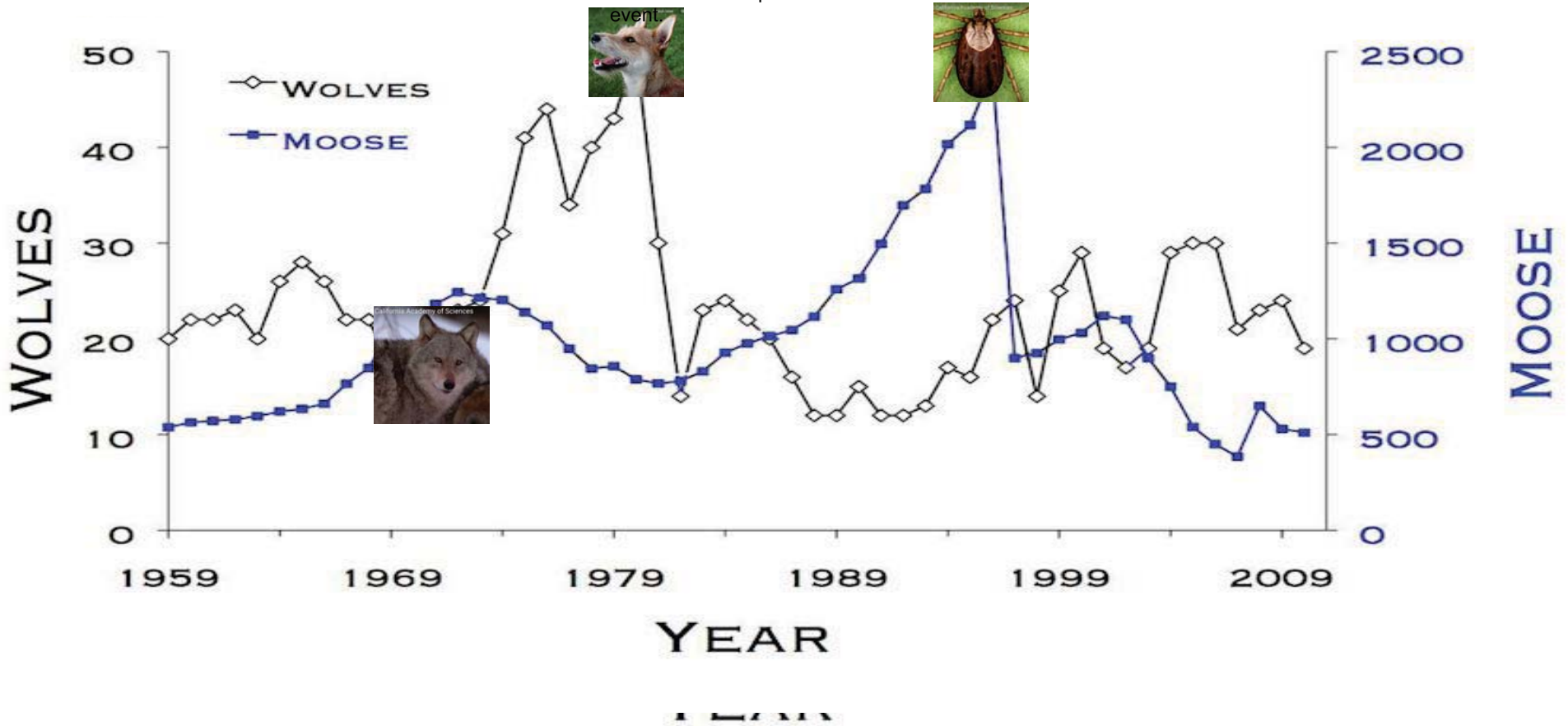
## Event 1: the dog

Over a two year period, canine parvovirus raged through the wolf population, decimating the ranks to less than ⅓ of the original population. The virus was inadvertently introduced by a dog from Chicago. populations weren't huge.



## Event 2: the Wolf

During one winter, a wolf emigrated from Canada to Isle Royale over an ice bridge that had formed. He added badly needed genetic diversity, and as a result, the wolves population did ok over the next 6 years, even though moose
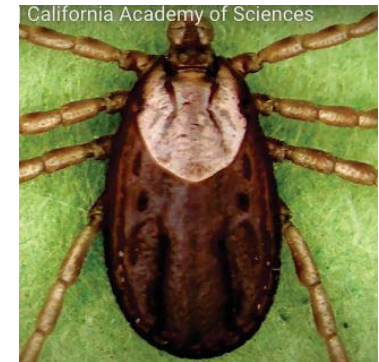


## Event 3: the ticks

With an extended period of low predation, moose populations soared- until one bad winter caused a lack of food the next year. That, alongside an outbreak of moose ticks conspired against the moose to reduce its population by 75%.
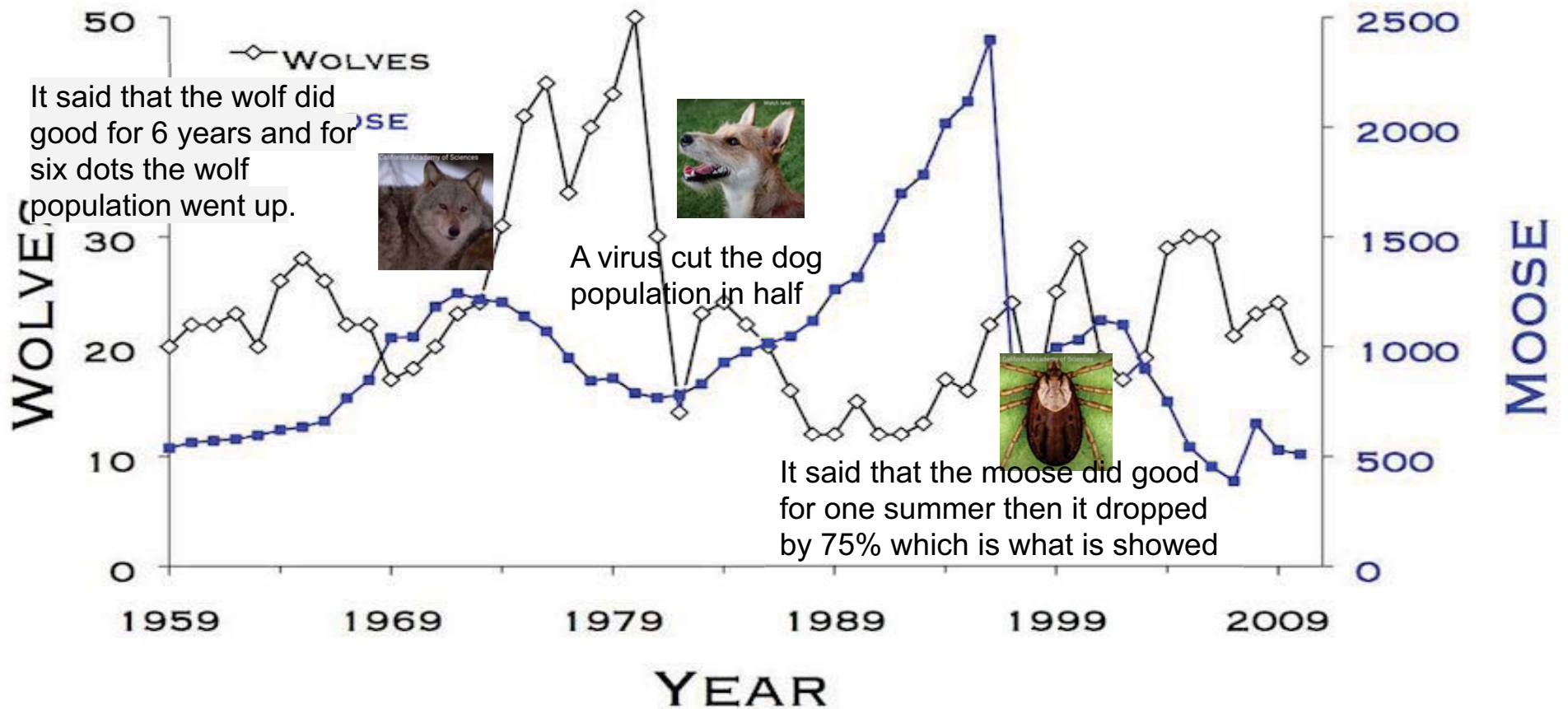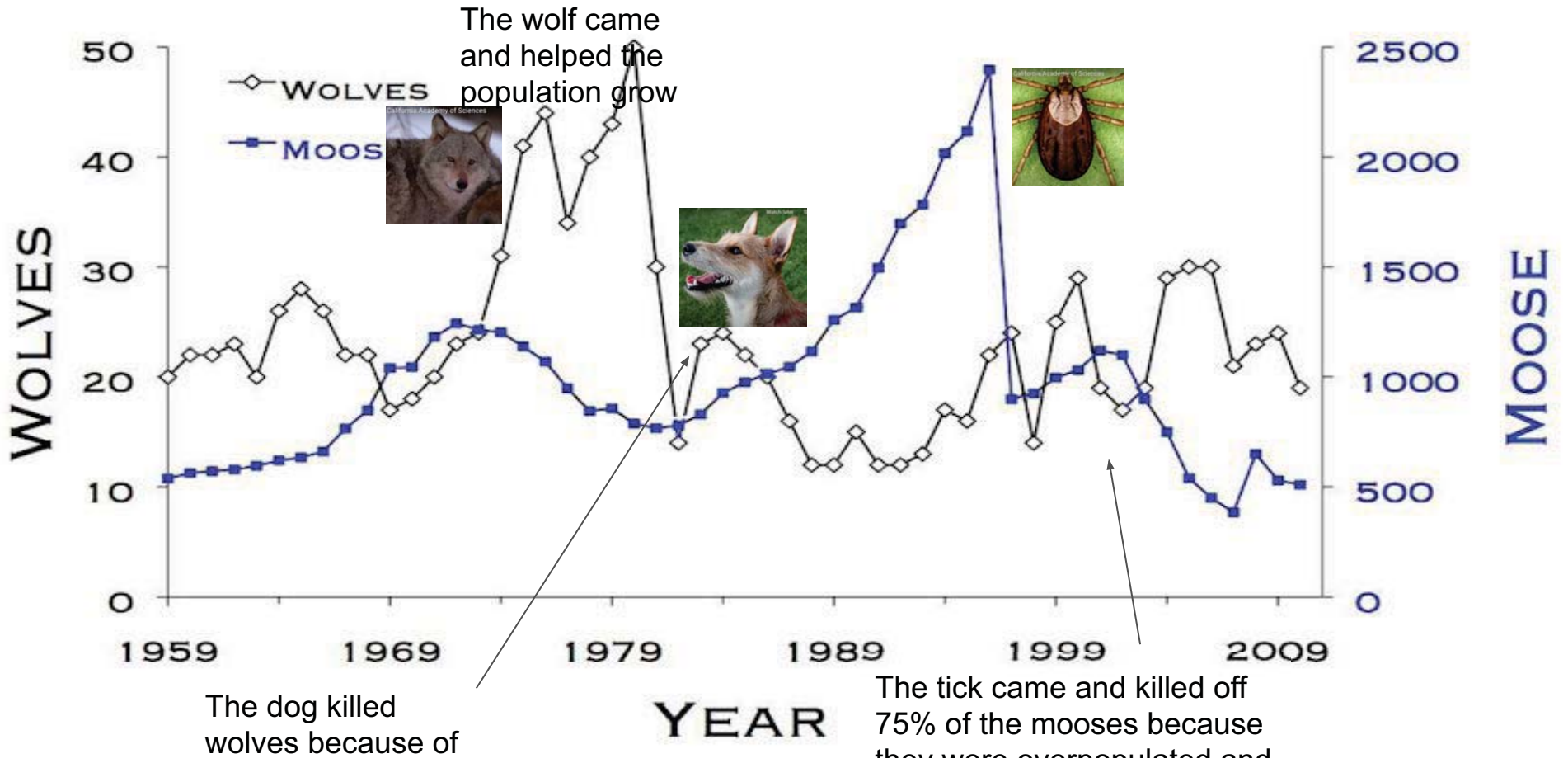
Breakout Group #3

Names: Alex T. and Maya

Around the year 1980, wolves were hunting moose, causing a decrease in the moose population, and an increase in the wolf population.

This dog spread a virus to over ½ the wolf population.

Around the year 2000, ticks slowly killed off the moose population. Because of this, many moose got sick or couldn't help their families, so many more moose died.

177
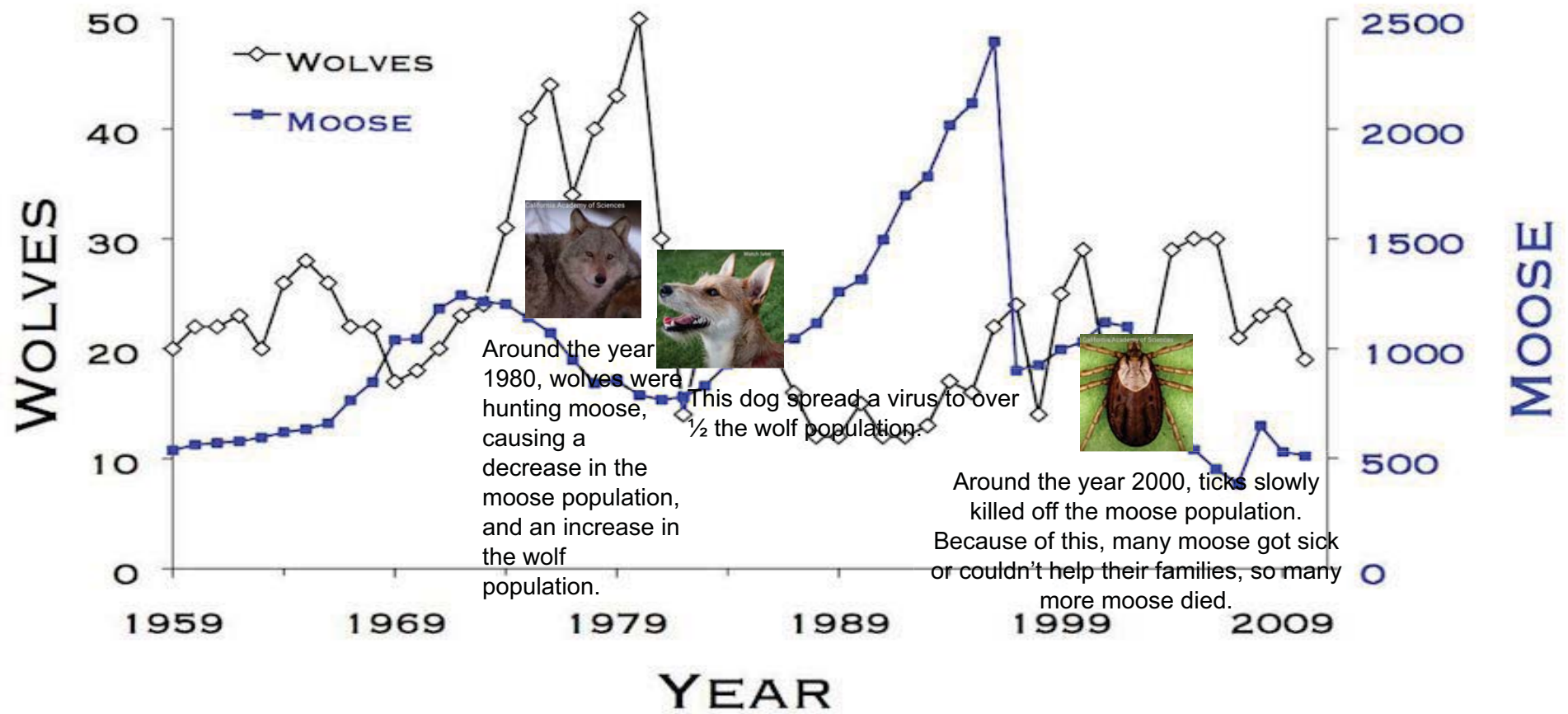
# Breakout Group #4

Names: Lauren, Rania



A dog from chicago brought a disease decimating the ranks to less than ⅓ of the original population.

The moose ticks wiped out 75% of the moose population.

After the wolf came, the population did ok for some years
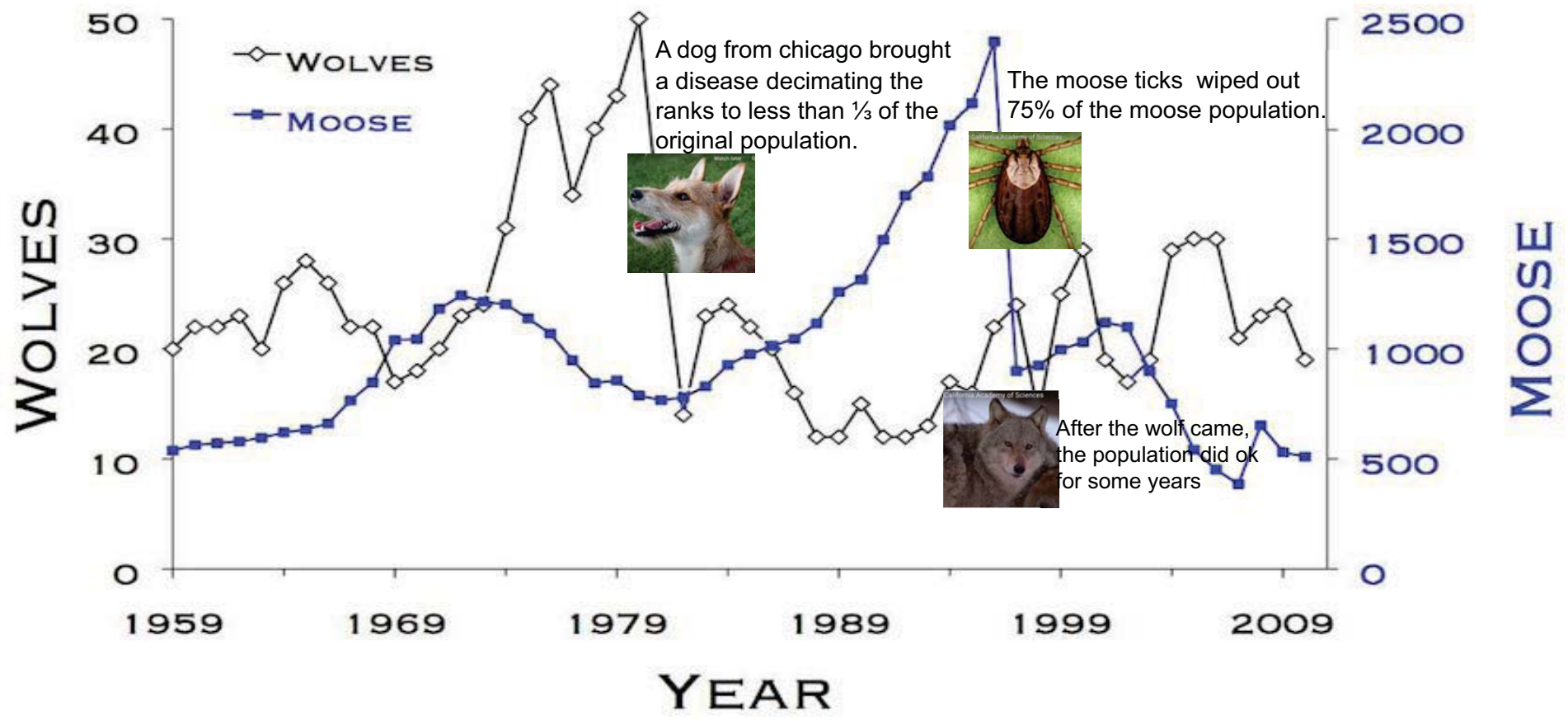
# Breakout Group #5

Names: Megan and Riley



179
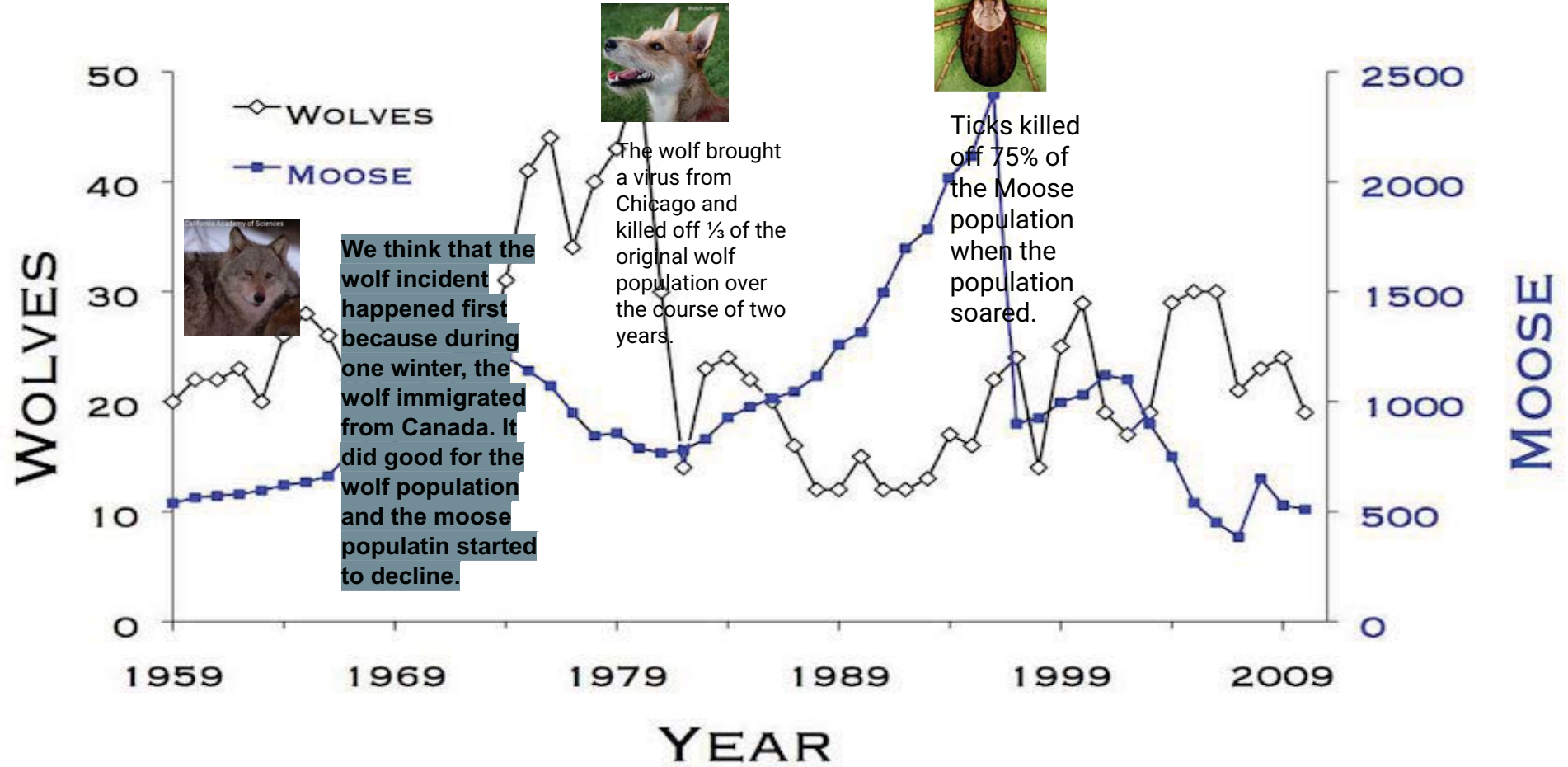
Breakout Group #6

Names:
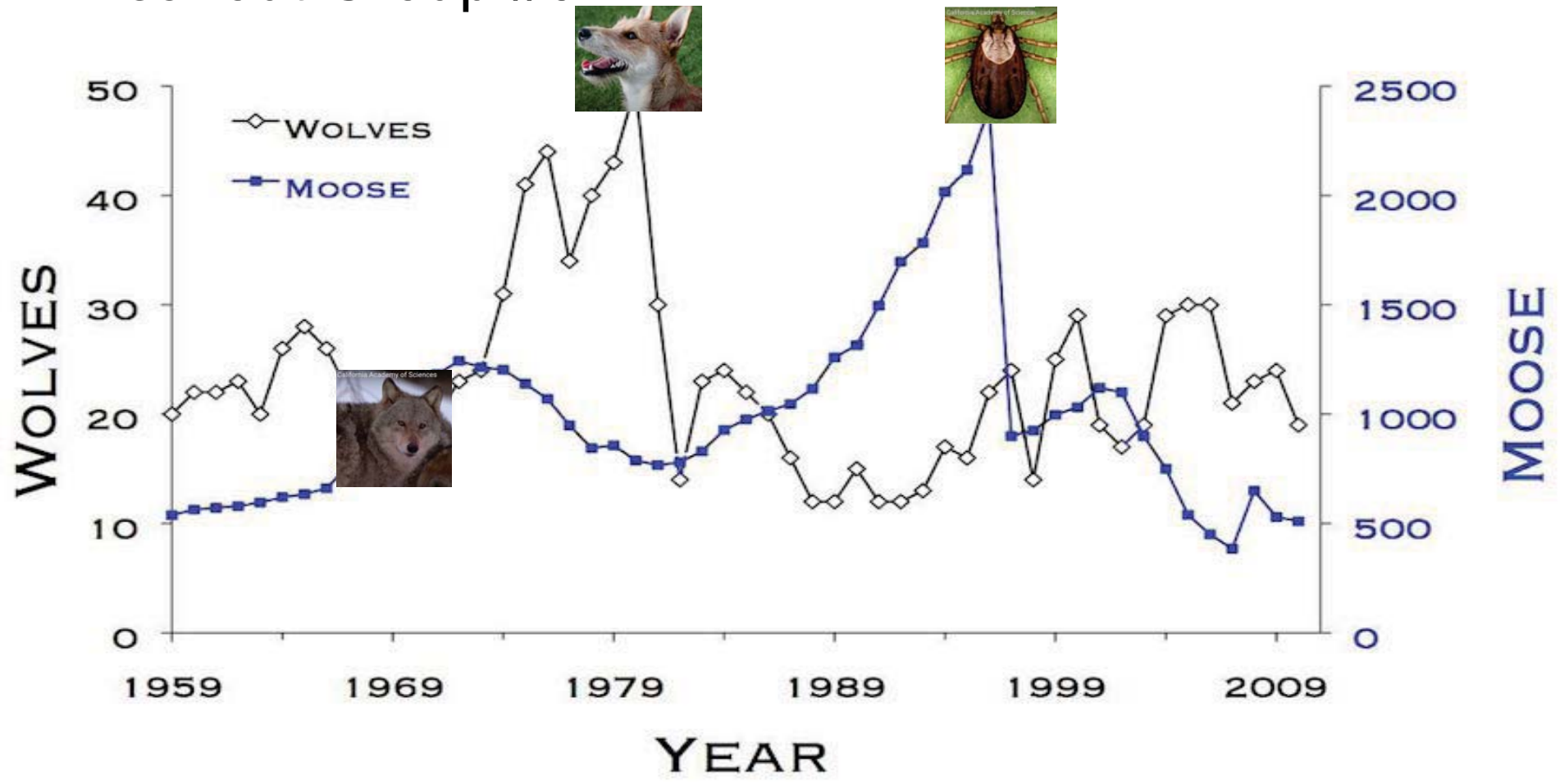
Breakout Group #7   Names:

181
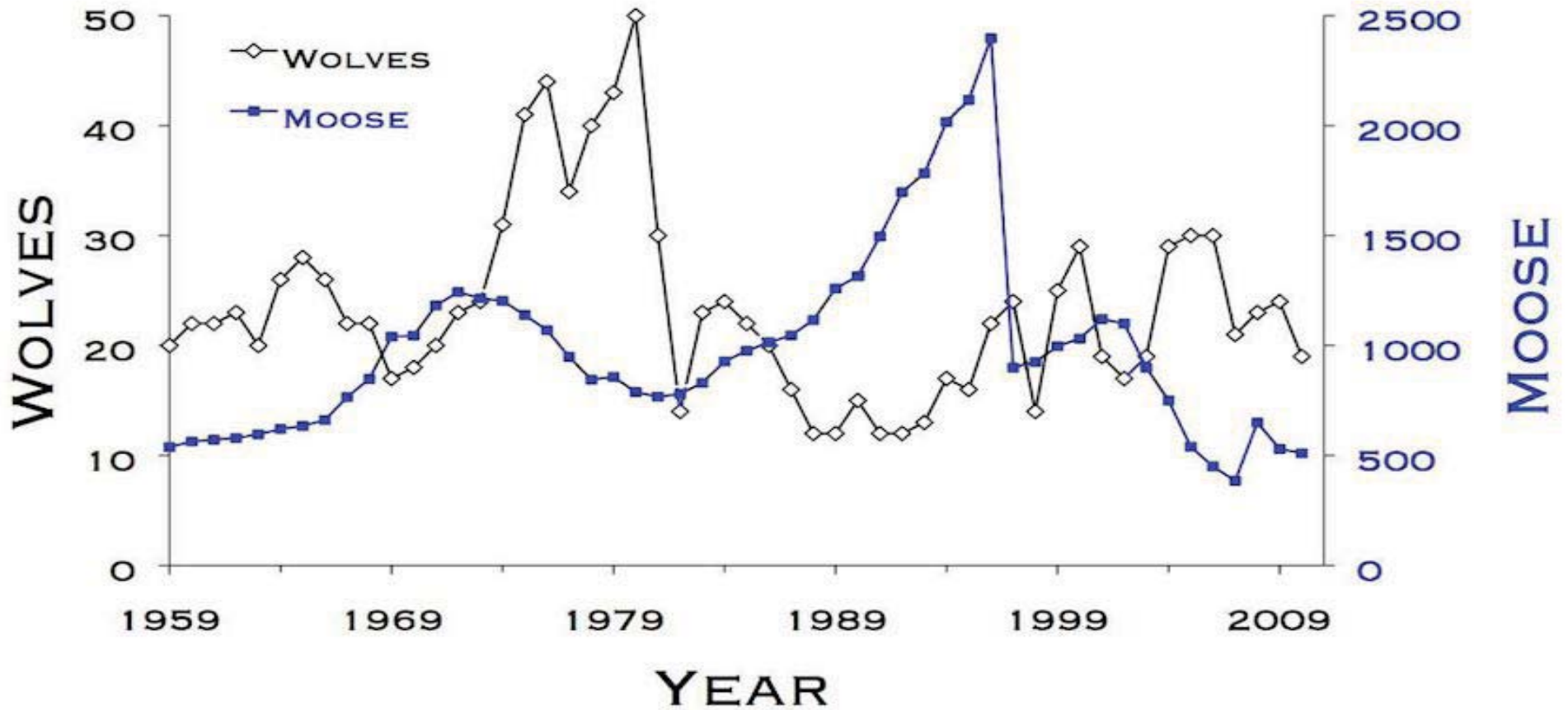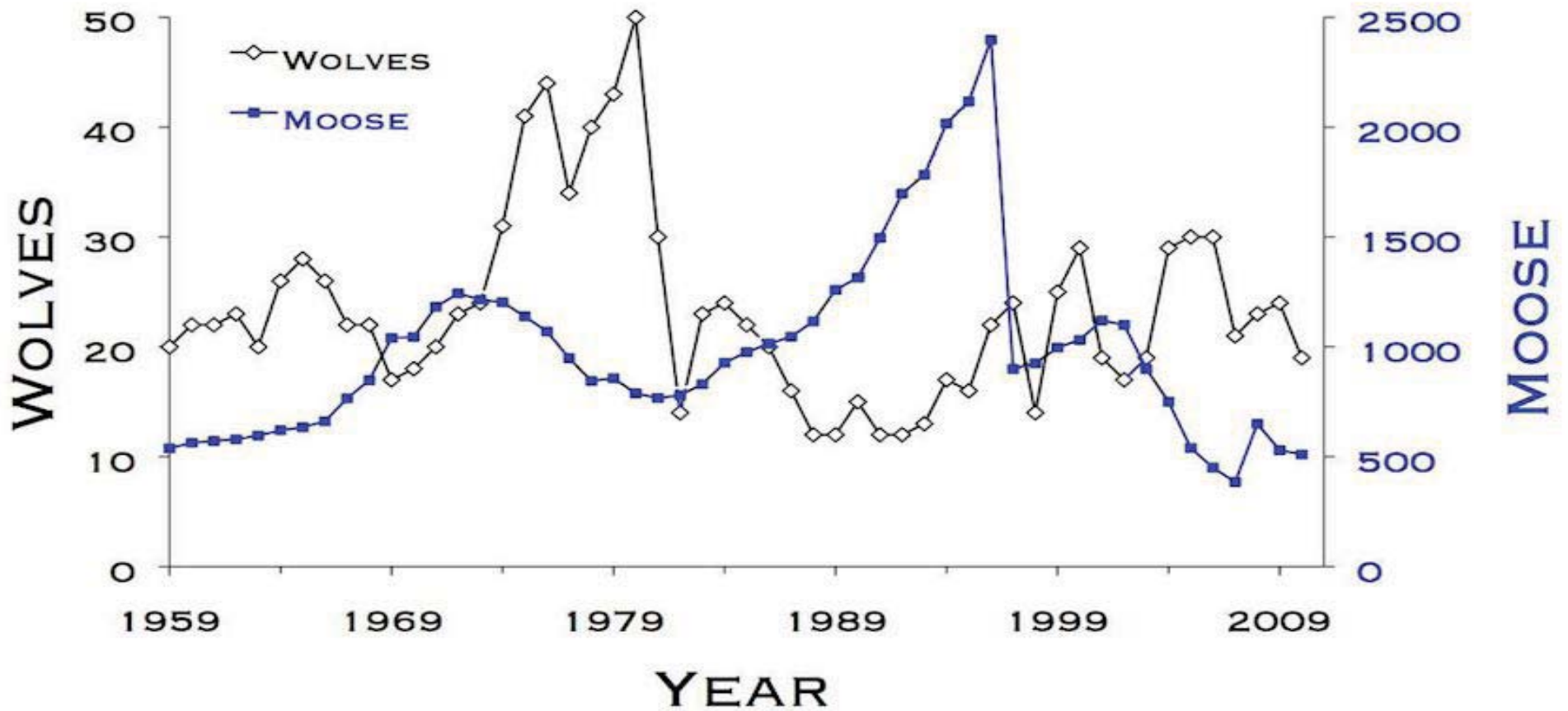
Breakout Group #9

Names:
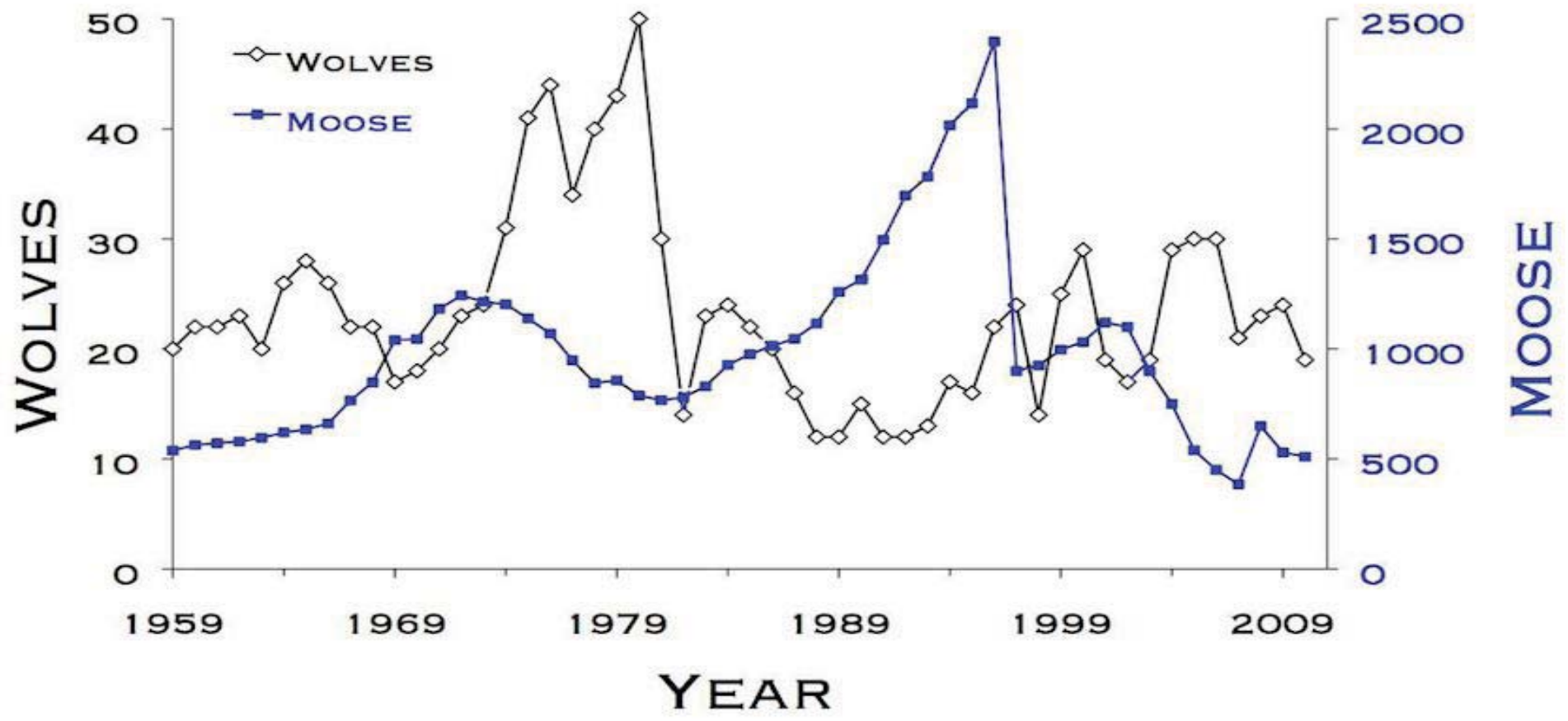
Breakout Group #10

Names:

184
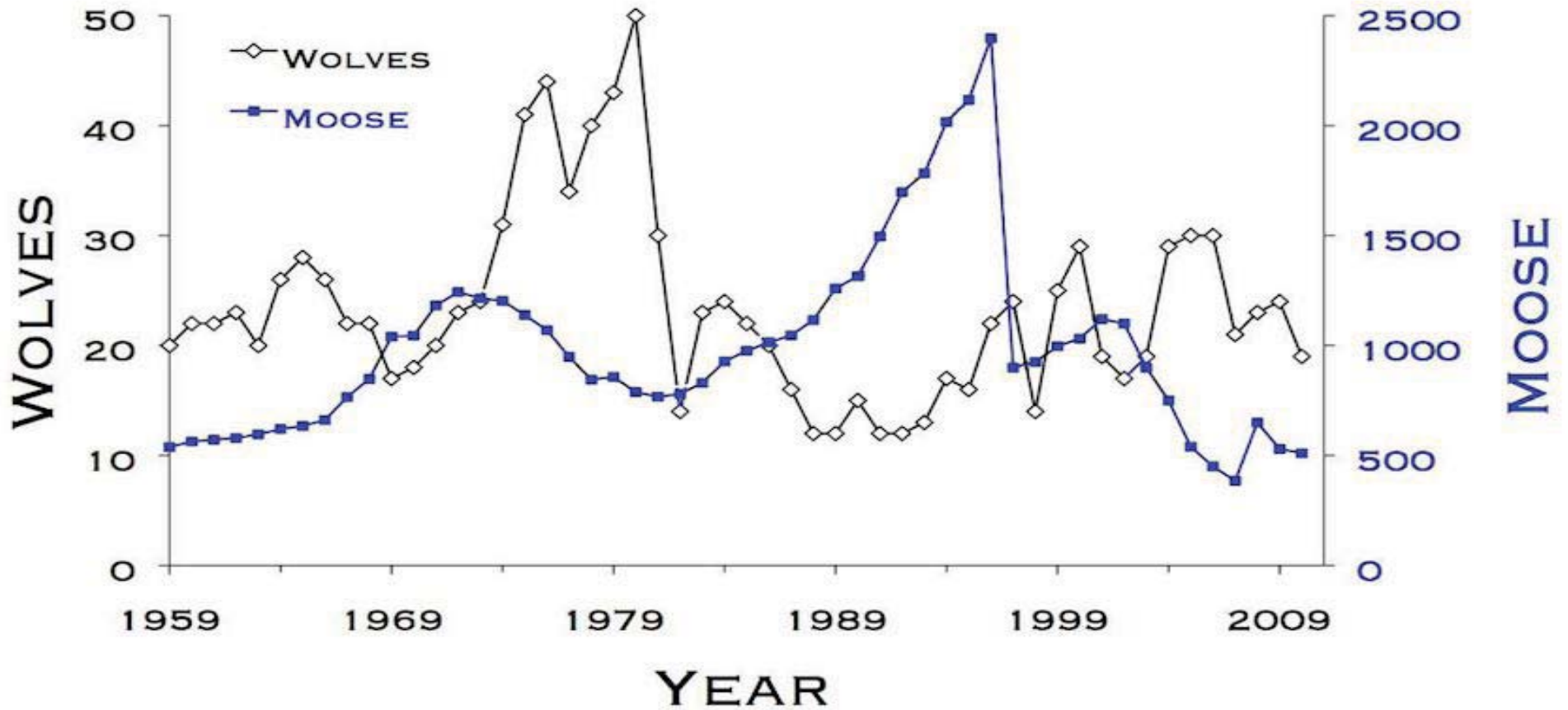
# Breakout Group #11



Names:
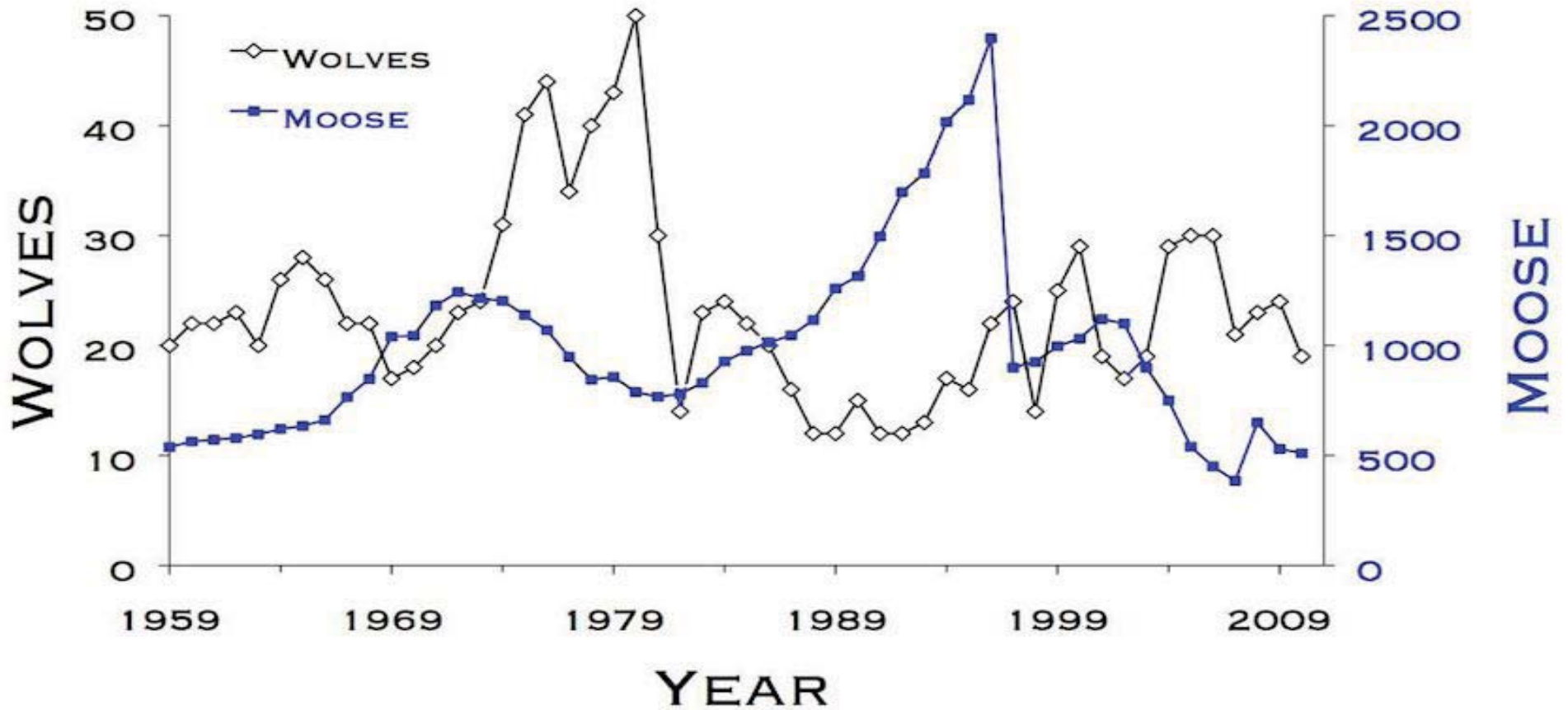
Breakout Group #12          Names:
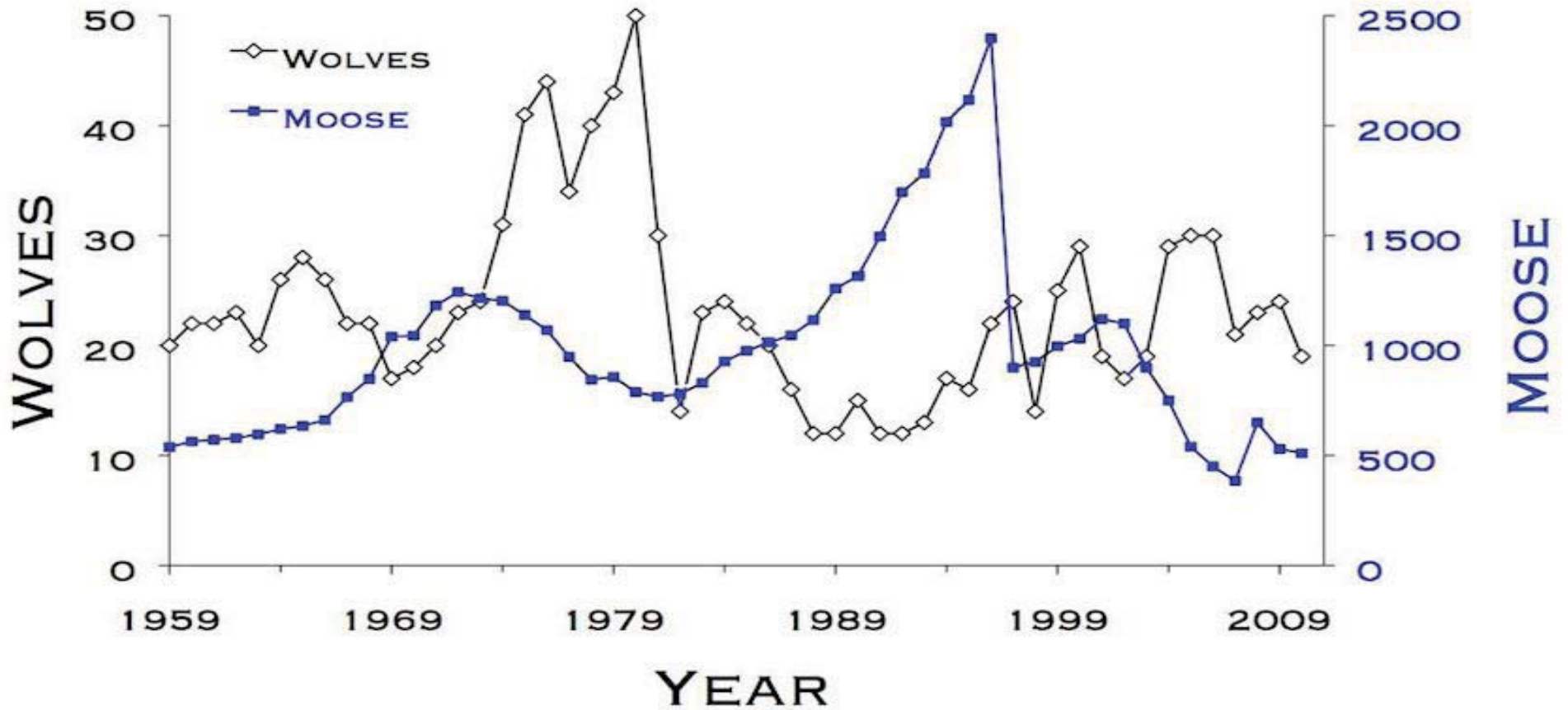
Breakout Group #13    Names:
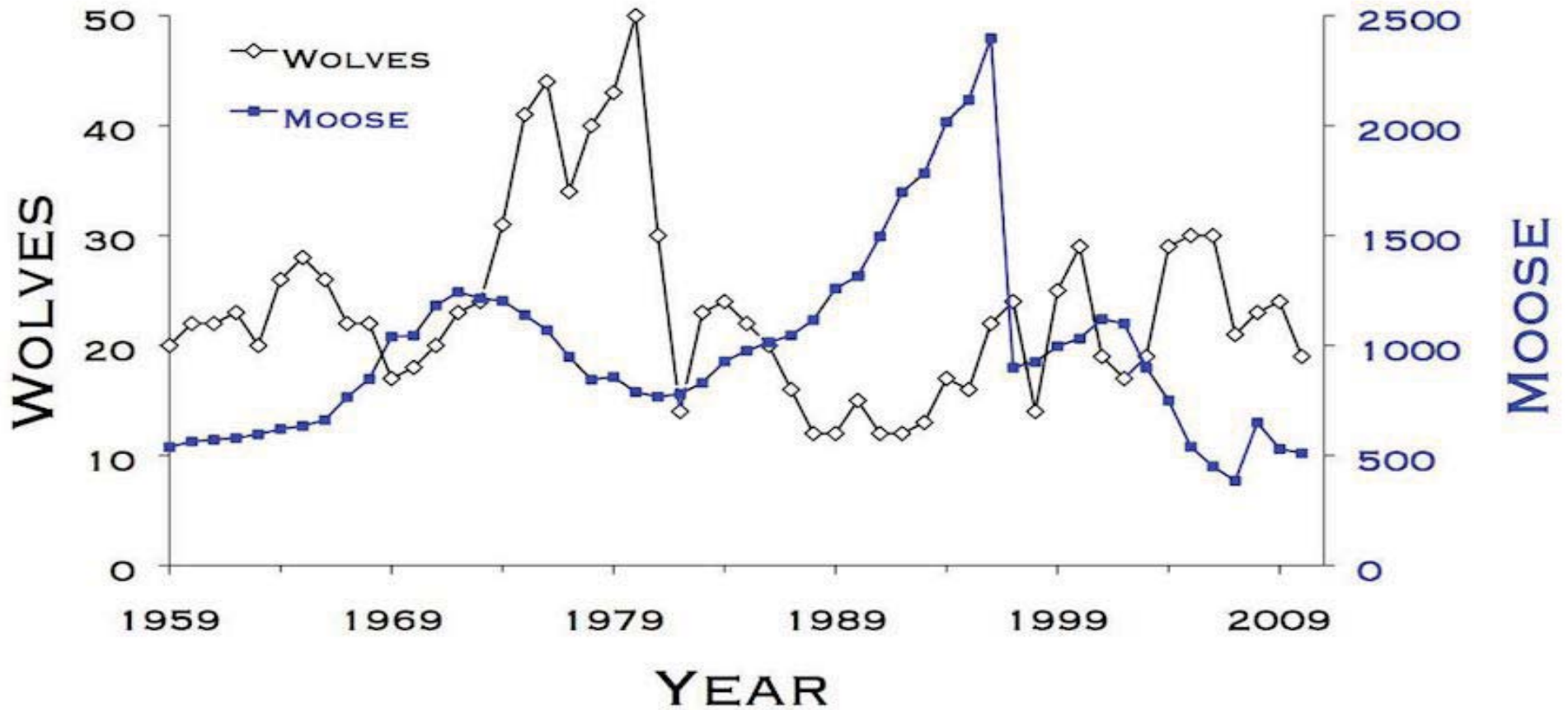
Breakout Group #14

Names:
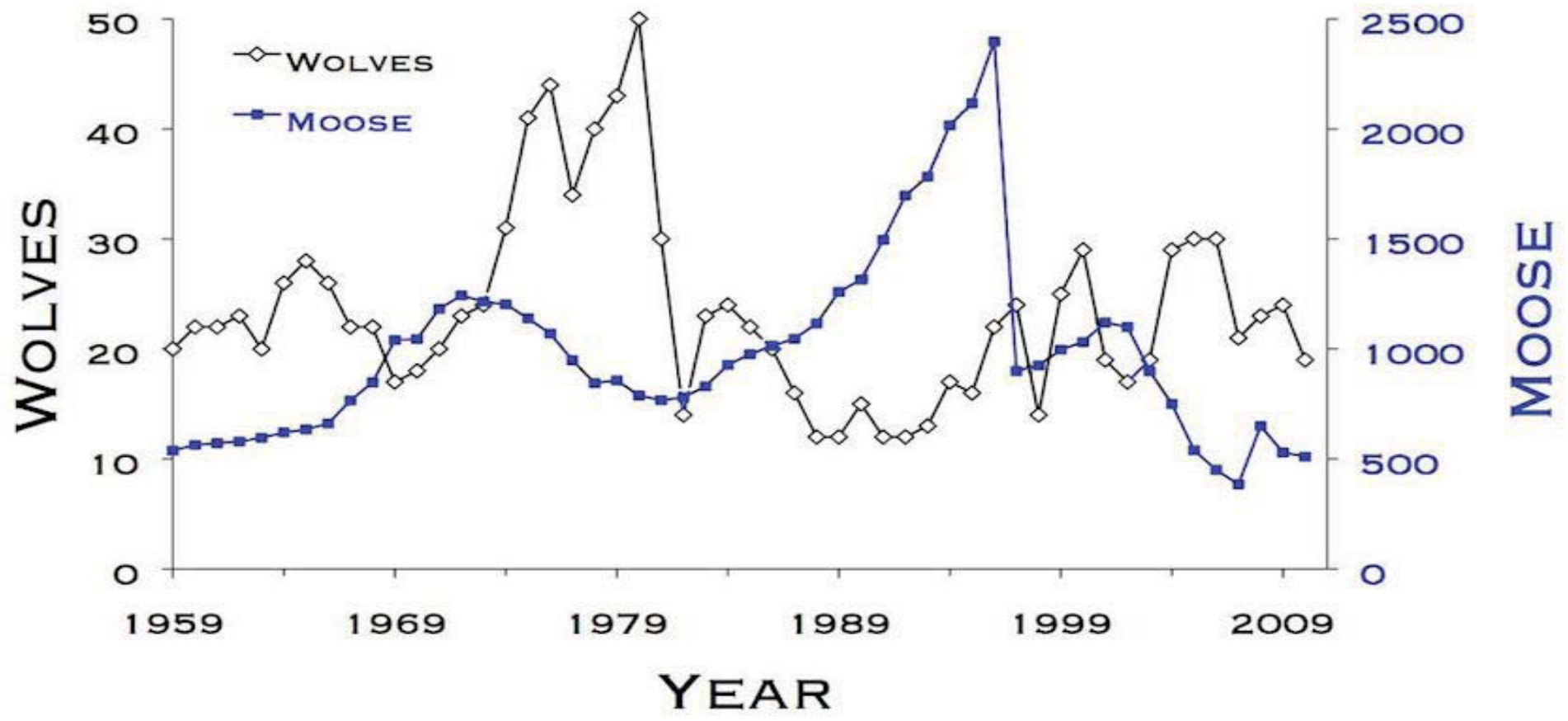
# Data Correlation

# What Is Correlation?

Correlation, is a statistic that measures the degree to which two sets of data move in relation to each other.

# KEY TAKEAWAYS

- Correlation is a statistic that measures the degree to which two variables move in relation to each other.
- Correlation measures association, but doesn't show if x causes y or vice versa, or if the association is caused by a third–perhaps unseen–factor.

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# What Is Spurious Correlation

In statistics, a spurious correlation, or spuriousness, refers to a connection between two variables that appears causal but is not. Spurious relationships often have the appearance of one variable affecting another. This spurious correlation is often caused by a third factor that is not apparent at the time of examination.

# KEY TAKEAWAYS

- Spurious Correlation, or spuriousness, is when two factors appear casually related but are not.
- The appearance of a causal relationship is often due to similar movement on a chart which turns out to be coincidental or caused by a third "confounding" factor.
- Spurious Correlation can often be caused by small sample sizes or arbitrary endpoints.

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# What can go wrong with data stories?



People who drowned after falling out of a fishing boat correlates with Marriage rate in Kentucky
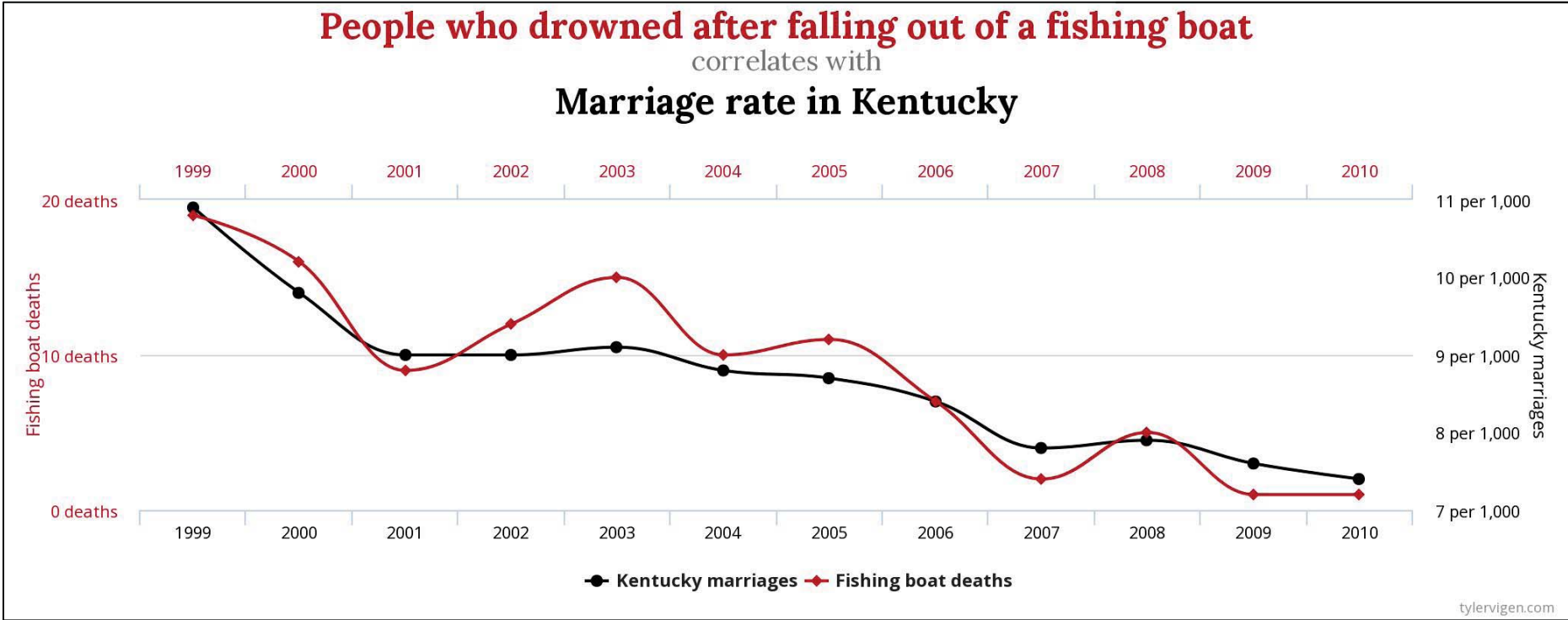
# Directions

- Find your breakout room number for your graph
- Spend a silent minute looking at your graph
- Talk about your graph with your group
- Create one or more "clickbait" titles using a textbox

# Breakout Room 1



**Letters in Winning Word of Scripps National Spelling Bee**
correlates with
**Number of people killed by venomous spiders**
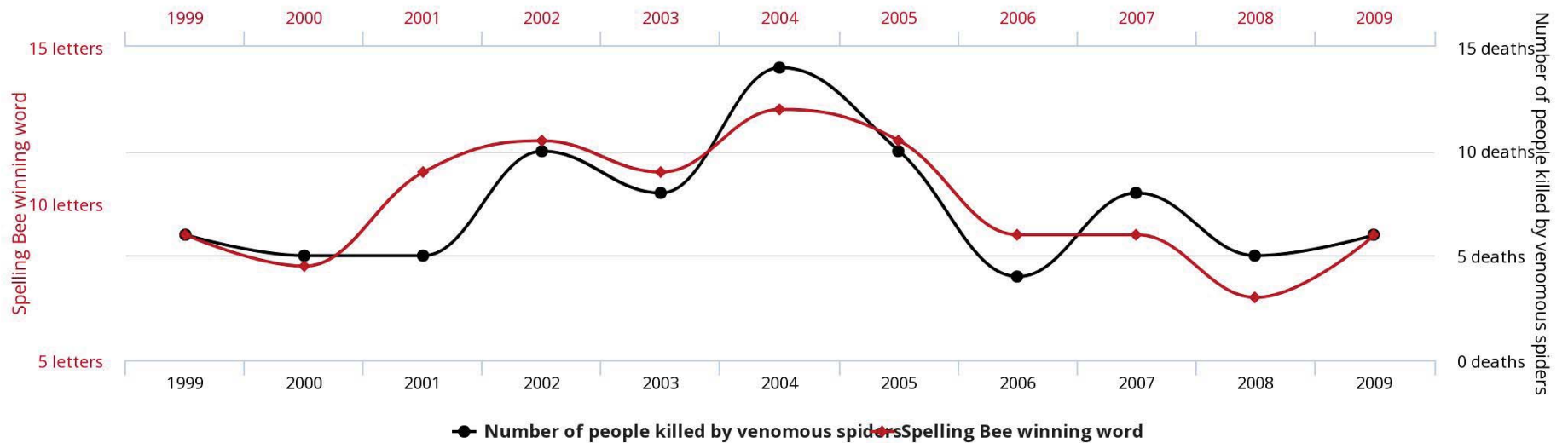
# Breakout Room 1 (leave blank for now)

**Headline:**

# Breakout Room 2



Per capita consumption of chicken
correlates with
Total US crude oil imports
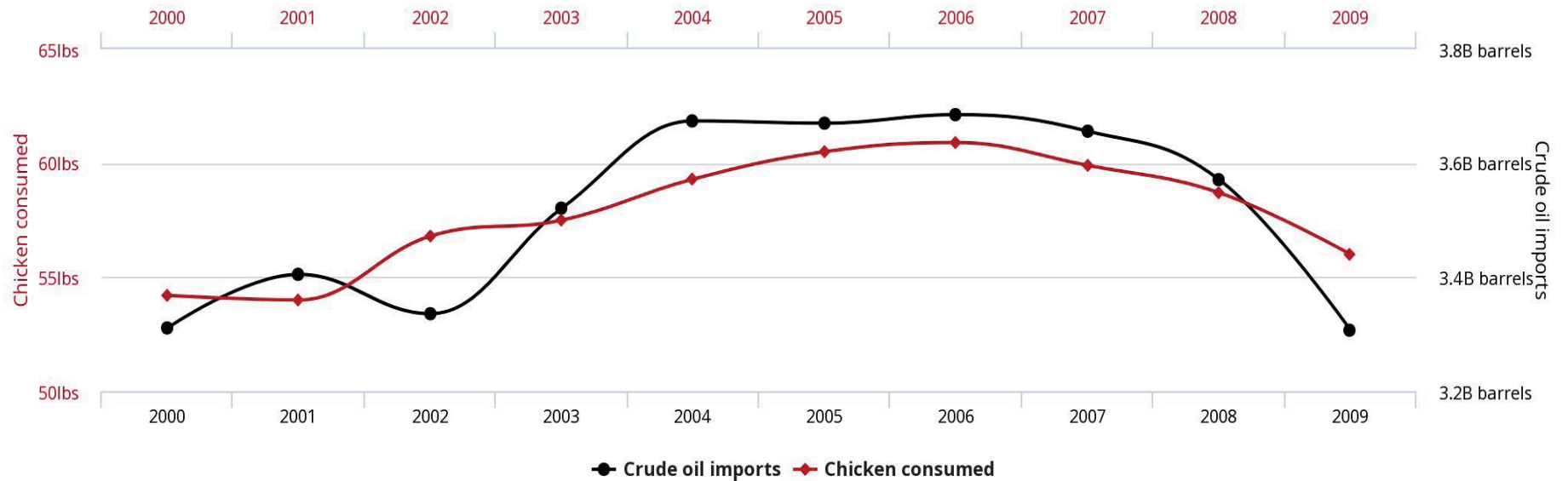
# Breakout Room 2

# Breakout Room 3



**Number of people who drowned by falling into a pool**
correlates with
**Films Nicolas Cage appeared in**
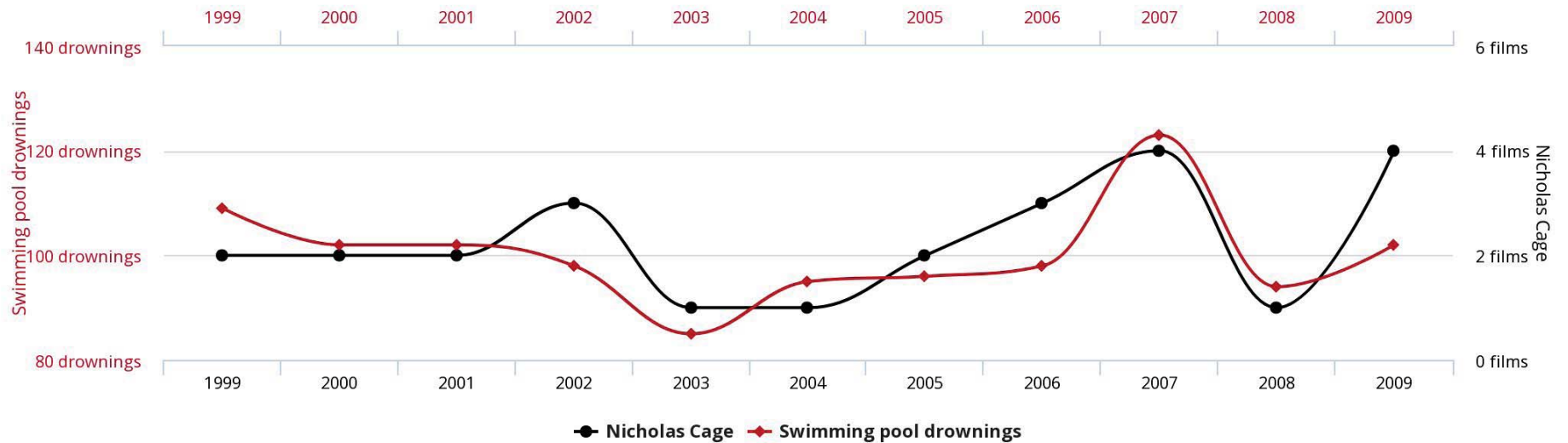
Breakout Room 3 (leave blank for now)

# Breakout Room 4



**Per capita cheese consumption**
correlates with
**Number of people who died by becoming tangled in their bedsheets**
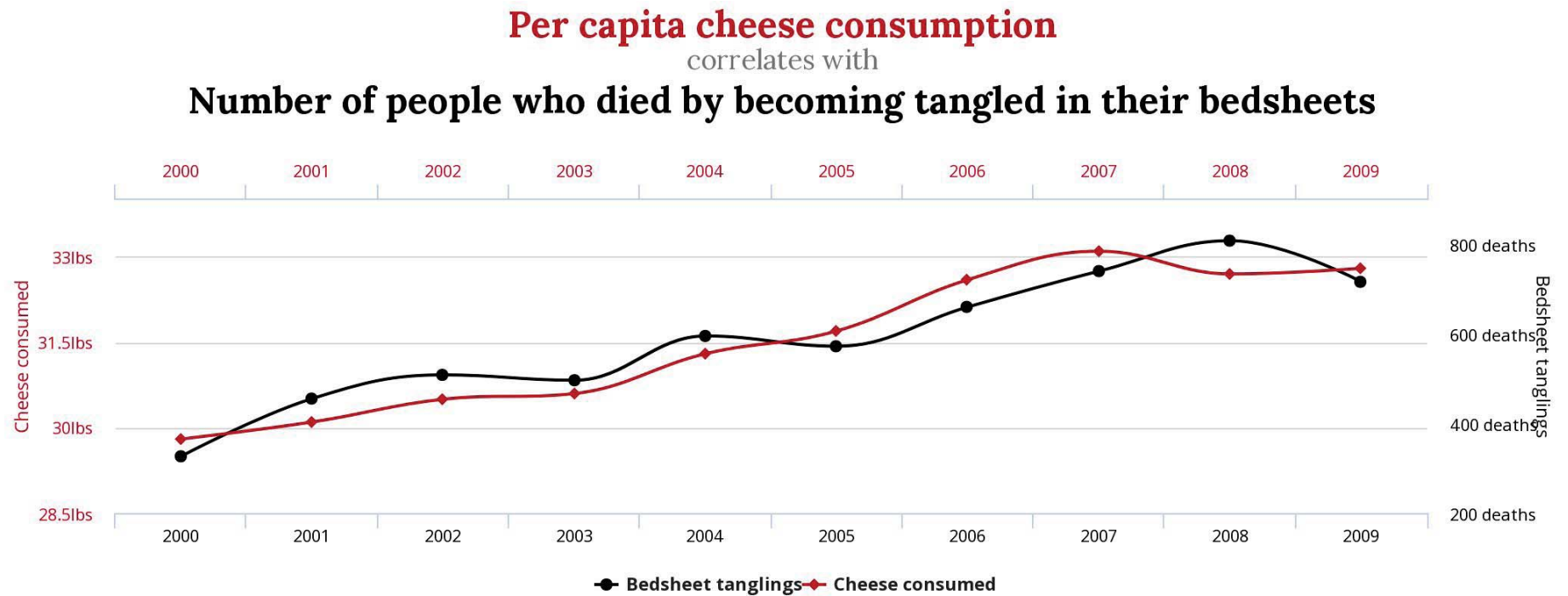
Breakout Room 4 (leave blank for now)

# Breakout Room 5



**Divorce rate in Maine**
correlates with
**Per capita consumption of margarine**

Legend: ● Margarine consumed ◆ Divorce rate in Maine
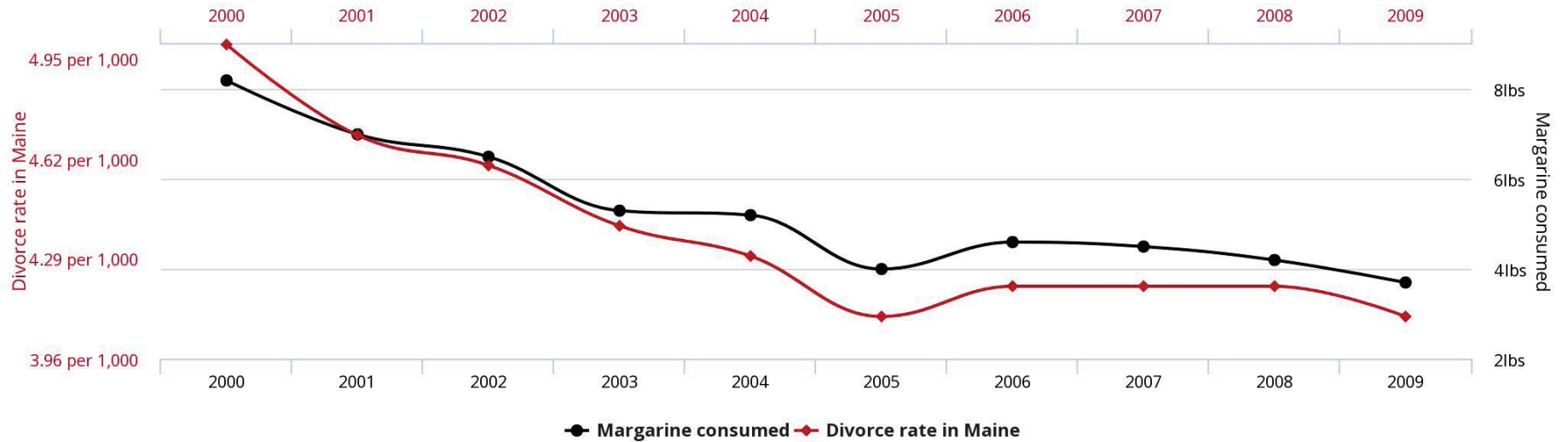
tylervigen.com

Breakout Room 5 (leave blank for now)

# Breakout Room 6



**Total revenue generated by arcades**
correlates with
**Computer science doctorates awarded in the US**
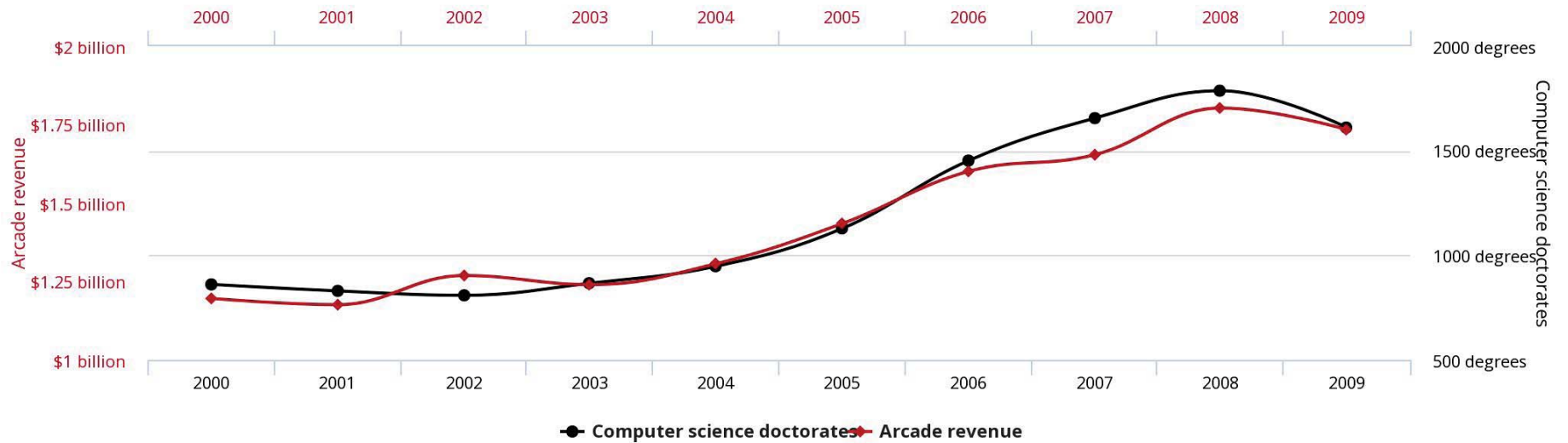
# Breakout Room 6 (leave blank for now)

# Breakout Room 7



Per capita consumption of mozzarella cheese
correlates with
Civil engineering doctorates awarded
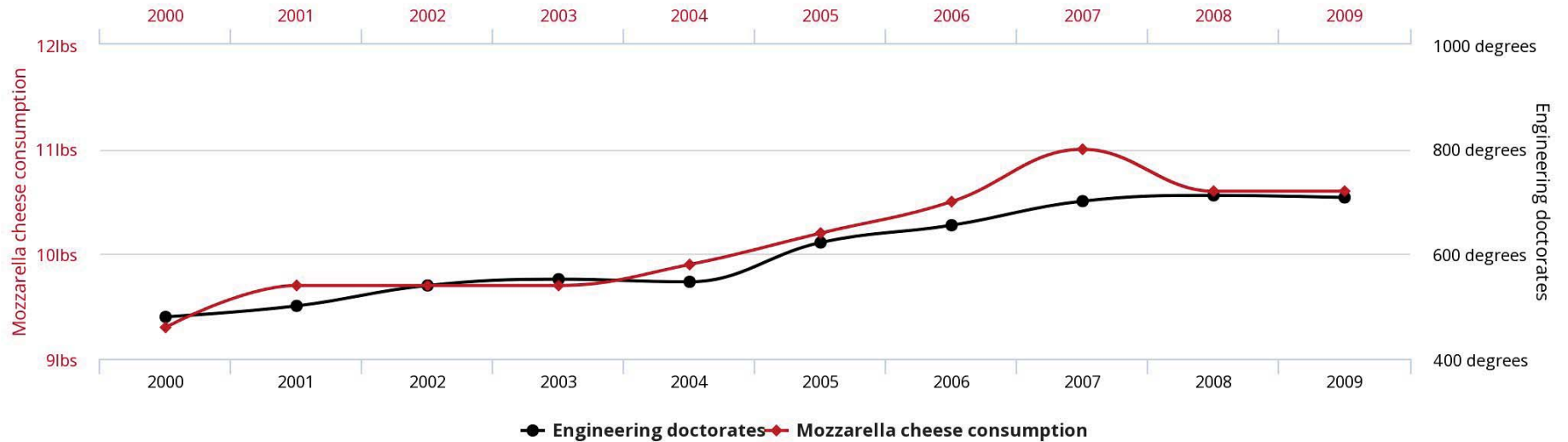
Breakout Room 7 (leave blank for now)

# Breakout Room 8



**Letters in Winning Word of Scripps National Spelling Bee**
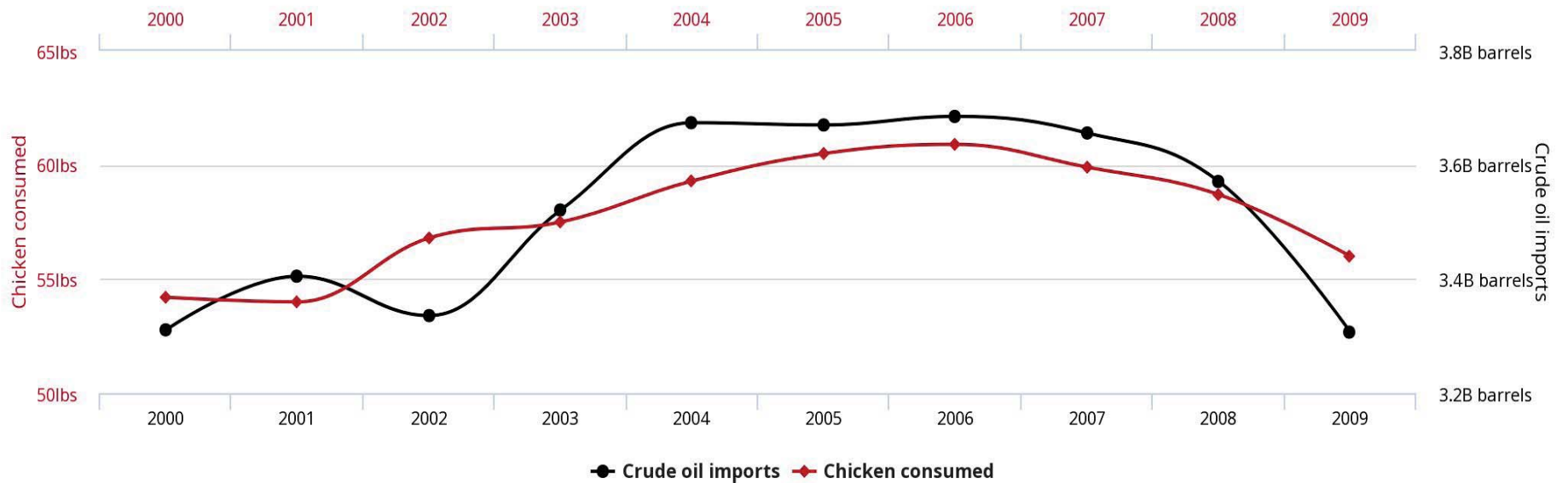correlates with
**Number of people killed by venomous spiders**
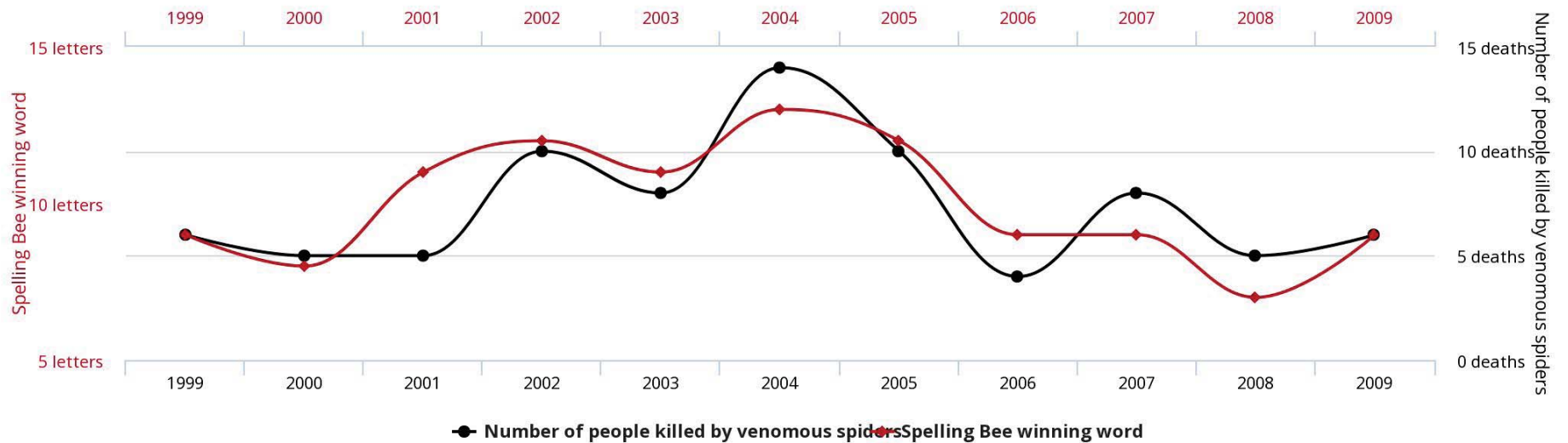
# Breakout Room 8 (leave blank for now)

# Breakout Room 9

**Per capita consumption of chicken**
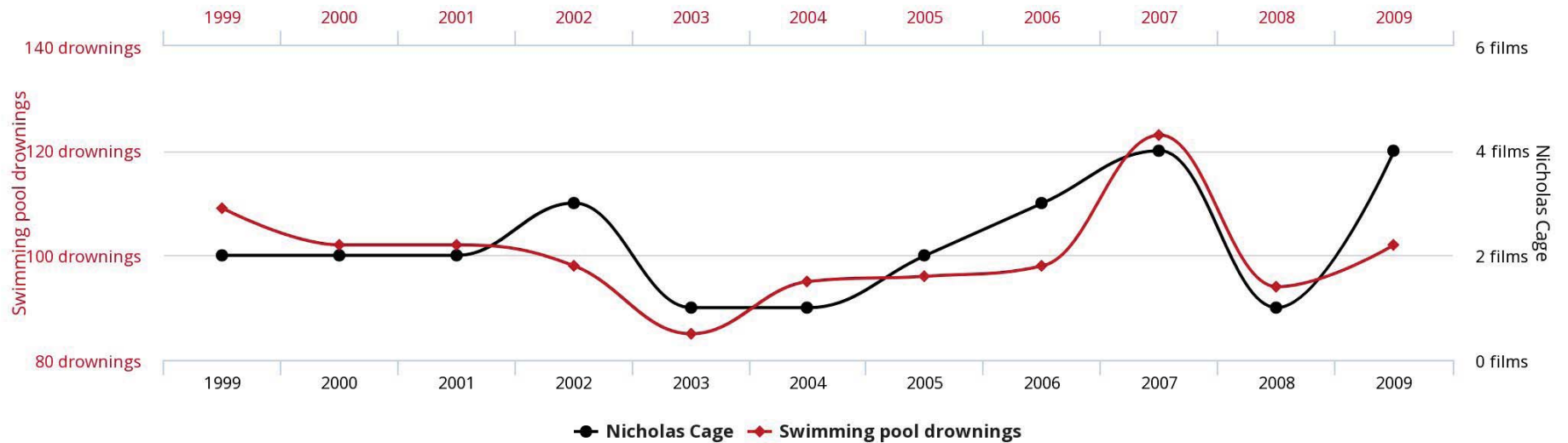correlates with
## Total US crude oil imports



tylervigen.com

# Breakout Room 9 (leave blank for now)

# Breakout Room 10



Number of people who drowned by falling into a pool correlates with Films Nicolas Cage appeared in

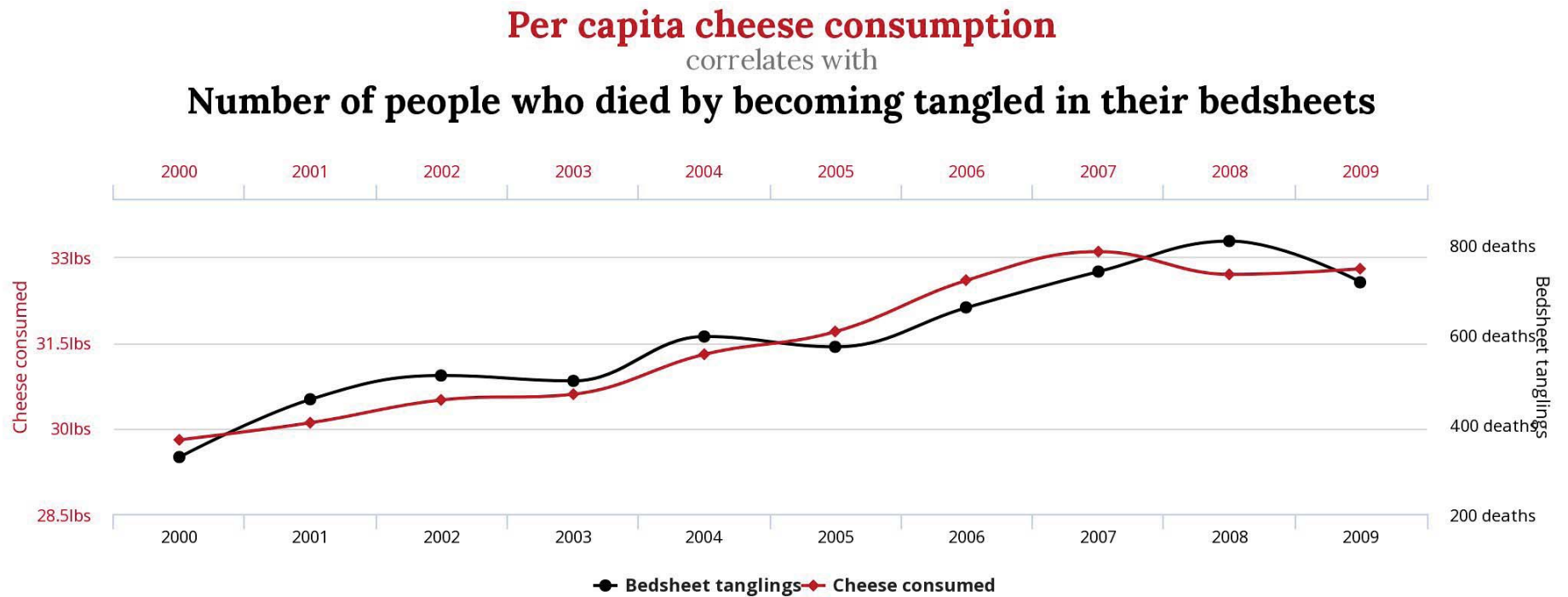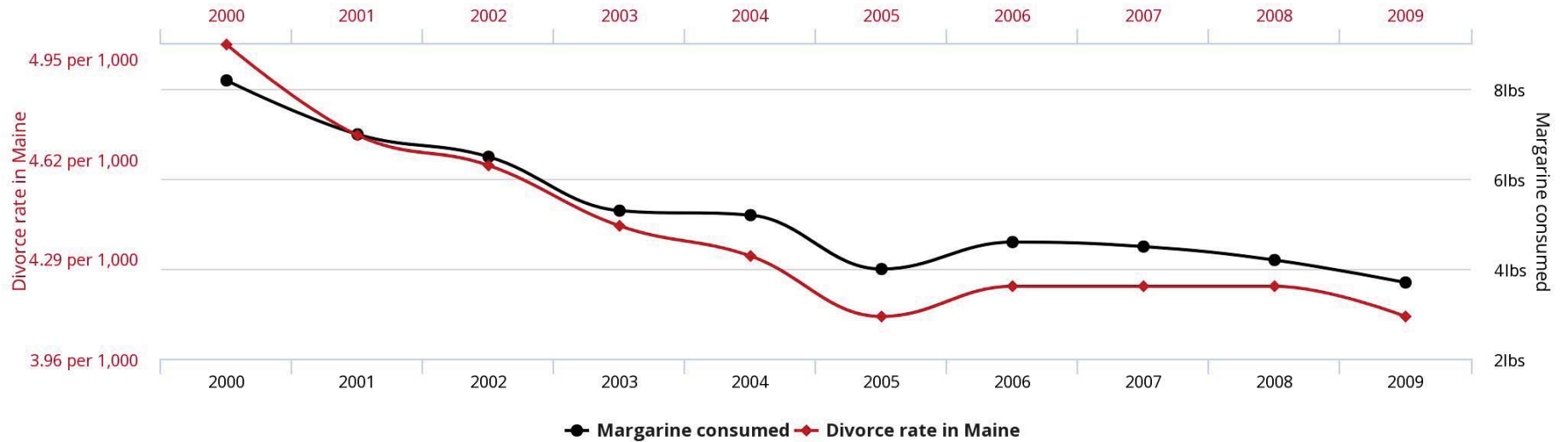Breakout Room 10 (leave blank for now)

# Breakout Room 11



**Per capita cheese consumption**
correlates with
**Number of people who died by becoming tangled in their bedsheets**

# Breakout Room 11 (leave blank for now)

# Breakout Room 12



## Divorce rate in Maine
correlates with
## Per capita consumption of margarine
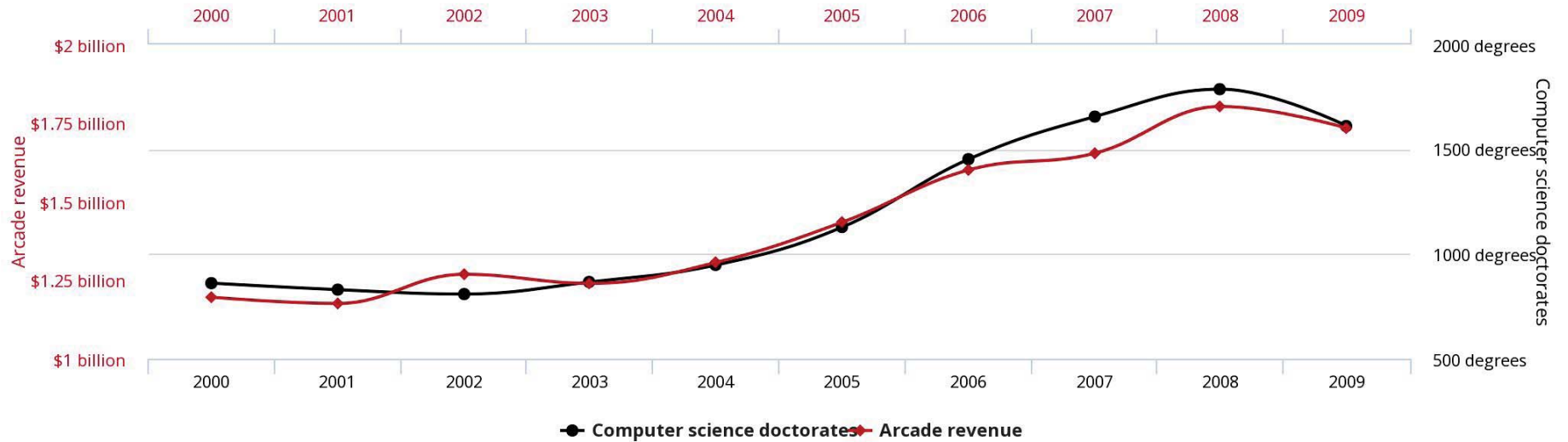
Legend: Margarine consumed, Divorce rate in Maine

tylervigen.com

# Breakout Room 12 (leave blank for now)

# Breakout Room 13

## Total revenue generated by arcades
correlates with
## Computer science doctorates awarded in the US



2000  2001  2002  2003  2004  2005  2006  2007  2008  2009

Arcade revenue: $2 billion, $1.75 billion, $1.5 billion, $1.25 billion, $1 billion

Computer science doctorates: 2000 degrees, 1500 degrees, 1000 degrees, 500 degrees

● Computer science doctorates  ◆ Arcade revenue

tylervigen.com

# Breakout Room 13 (leave blank for now)

# Breakout Room 14

## Per capita consumption of mozzarella cheese
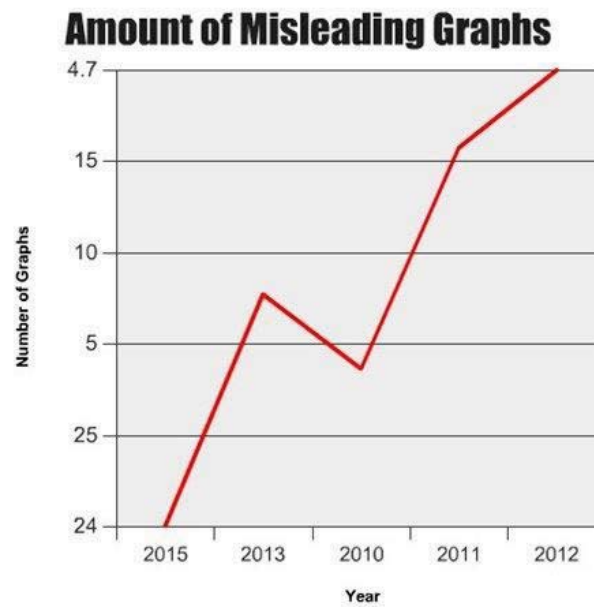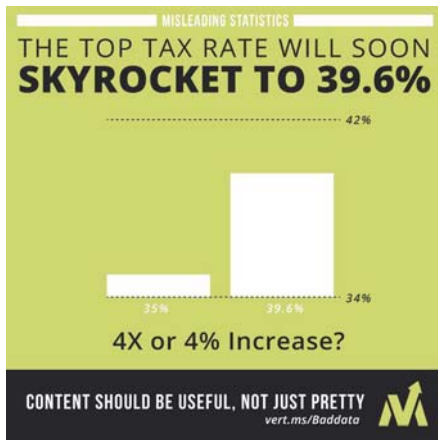correlates with
## Civil engineering doctorates awarded
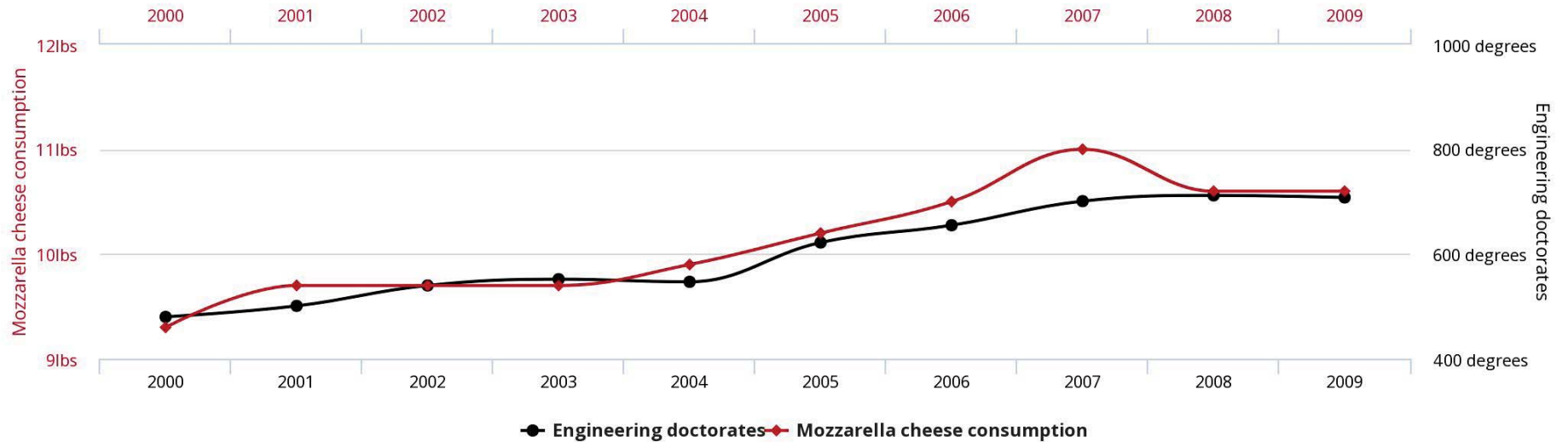
Breakout Room 14 (leave blank for now)

# Lies and Statistics

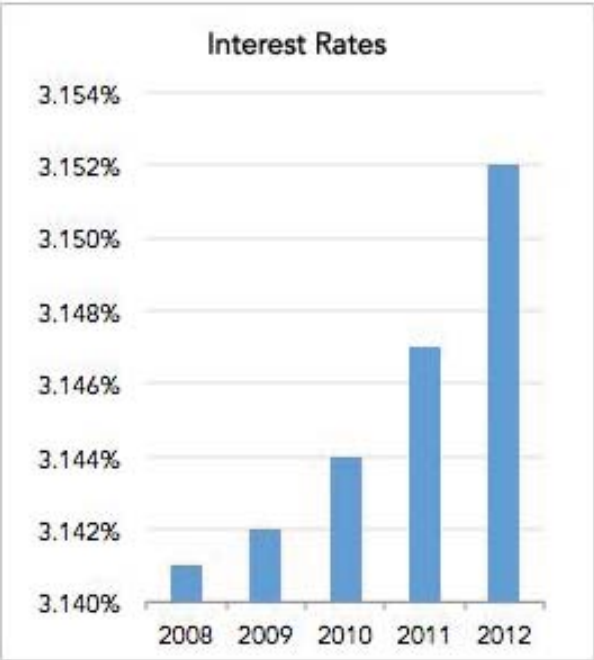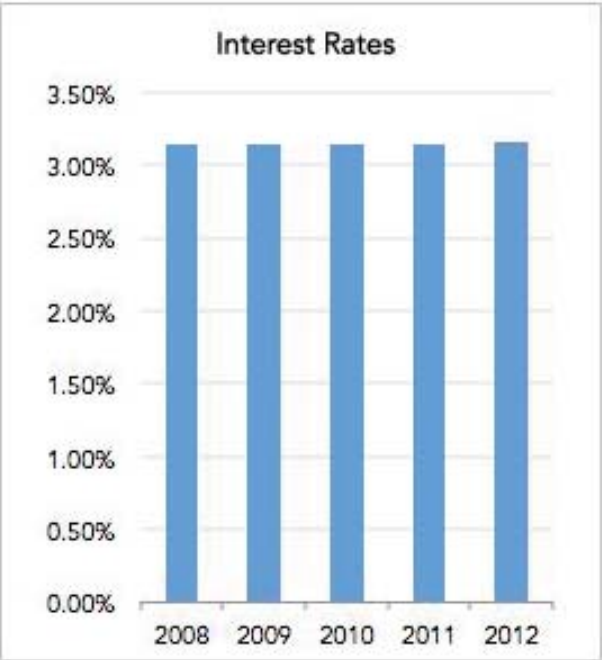# How can we be misled by data?

# Which graph shows a greater increase?



A

B

# They're the same!



**Same Data, Different Y-Axis**

# Another example



VS.
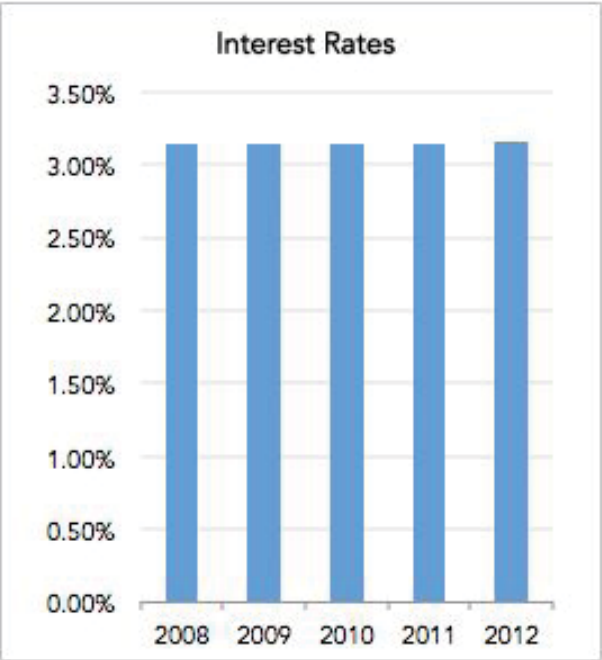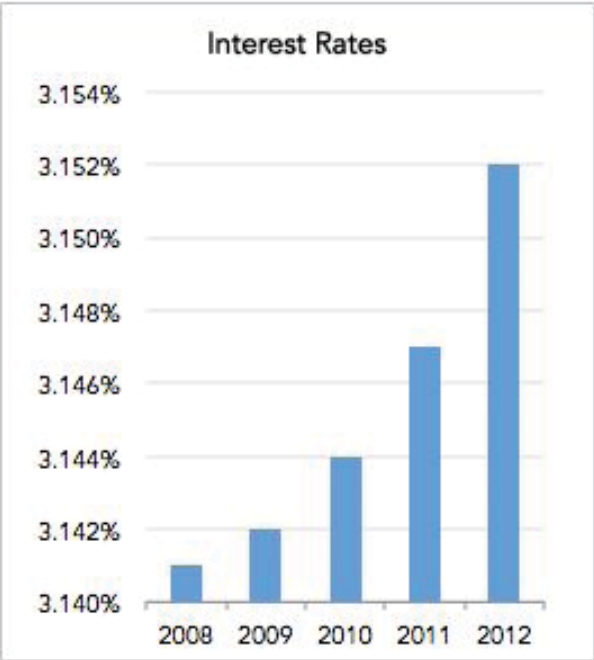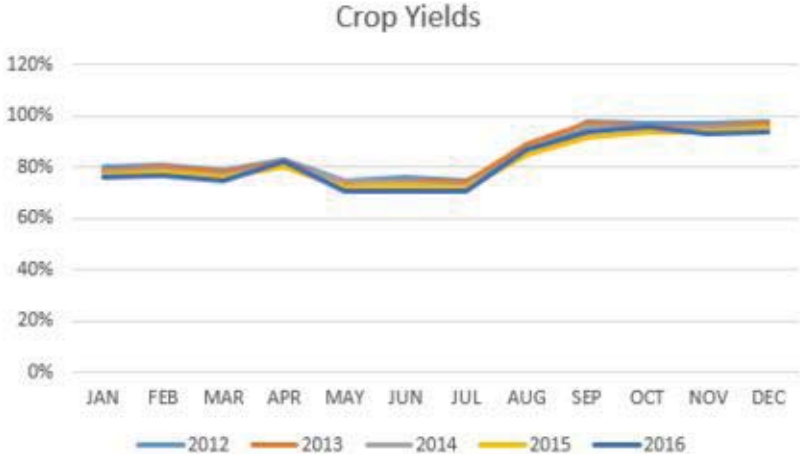
Crop Yields — Y-Axis starting at 0%
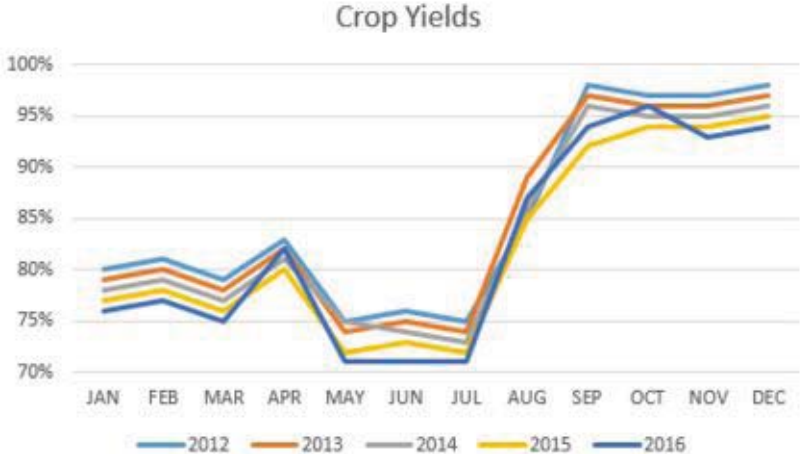
Crop Yields — Y-Axis starting at 70%

# Omitting the baseline

Is when you don't start the Y-axis at 0.  Sometimes it makes sense to omit the baseline, BUT you need to watch out for it!

Omitting the baseline makes differences look much larger.
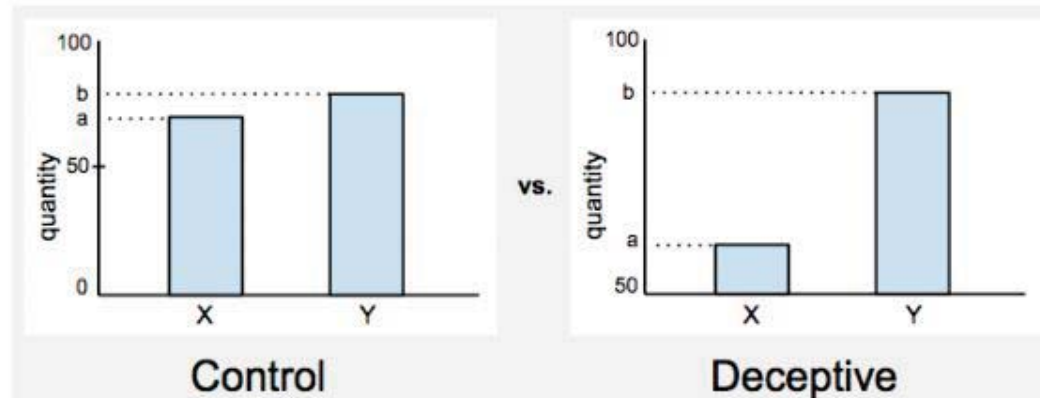


**Figure 2. Illustration showing Truncated Axis distortion, which leads to message exaggeration/understatement type of deception.**

# Expanding or Compressing the Scale

Same info, different Y axis



Average Annual Global Temperature in Fahrenheit
1880-2015

Average global temperature by year
Data from NASA/GISS.
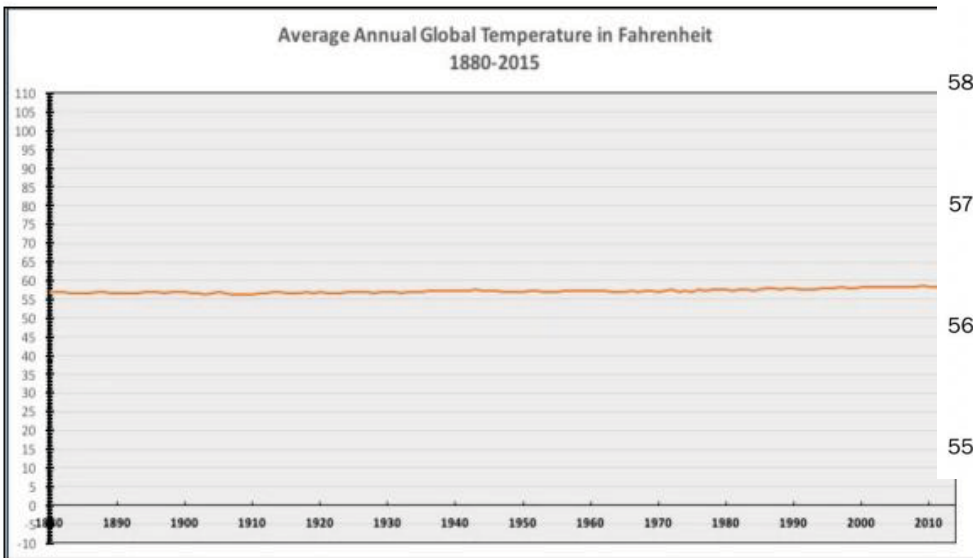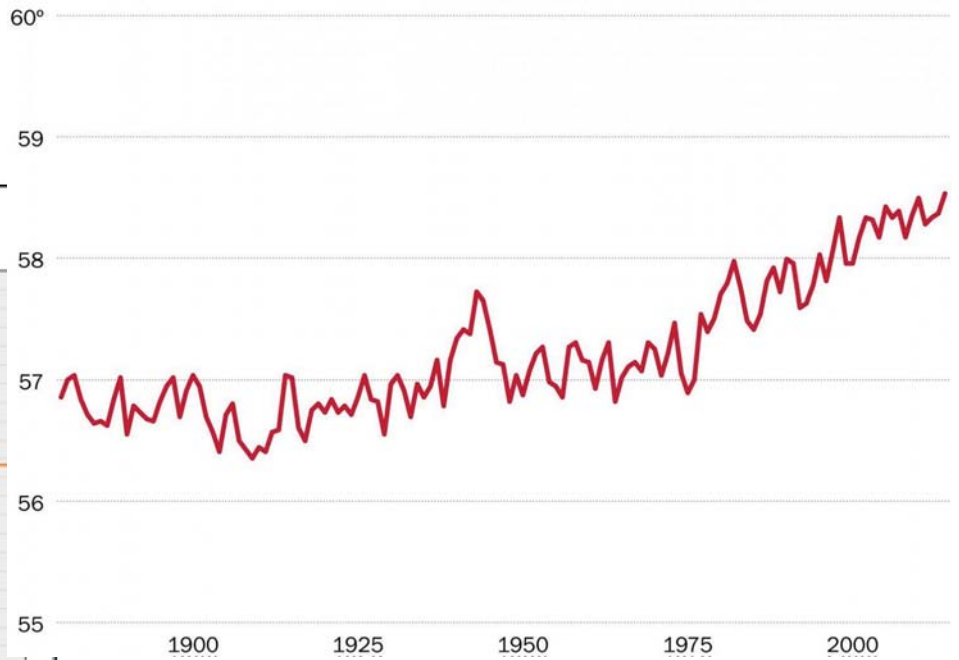
# Changing the Scale
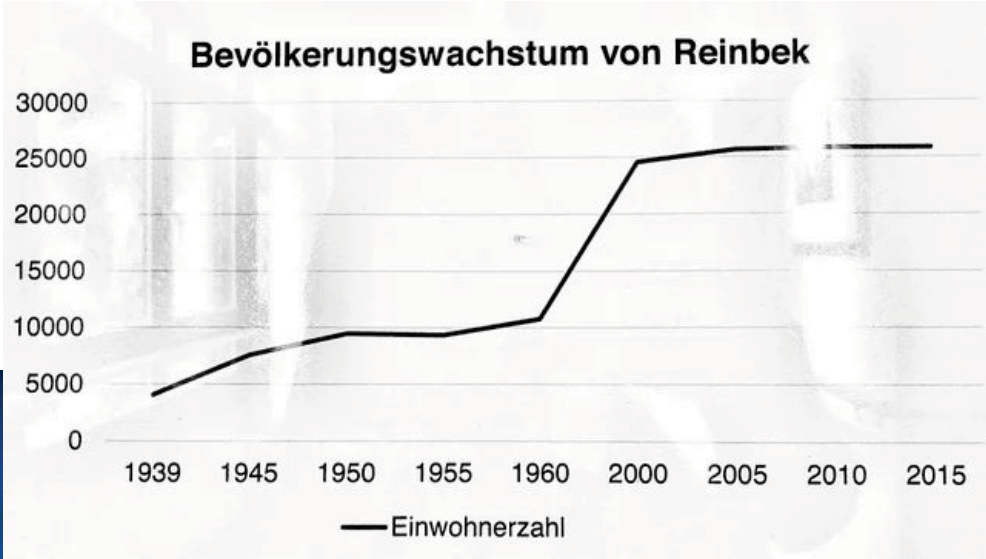
# Manipulating the Whole Visual

Same graph,

Same data,

But at first glance...
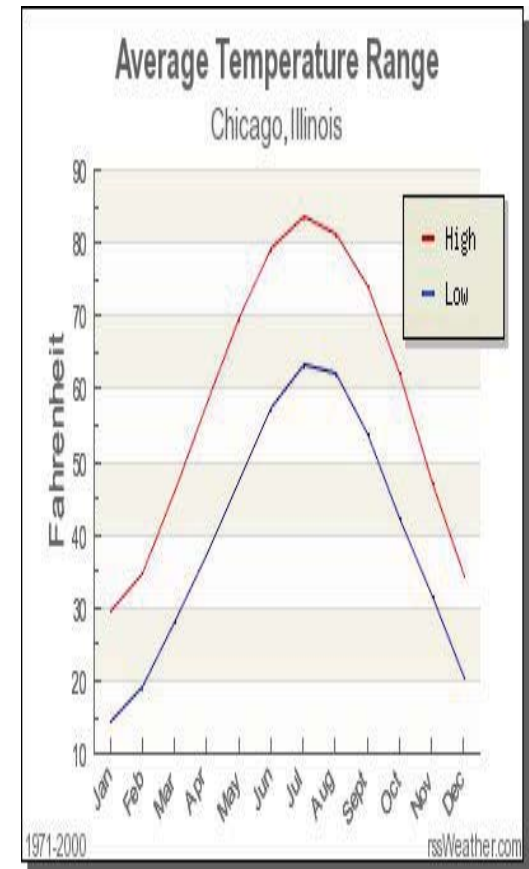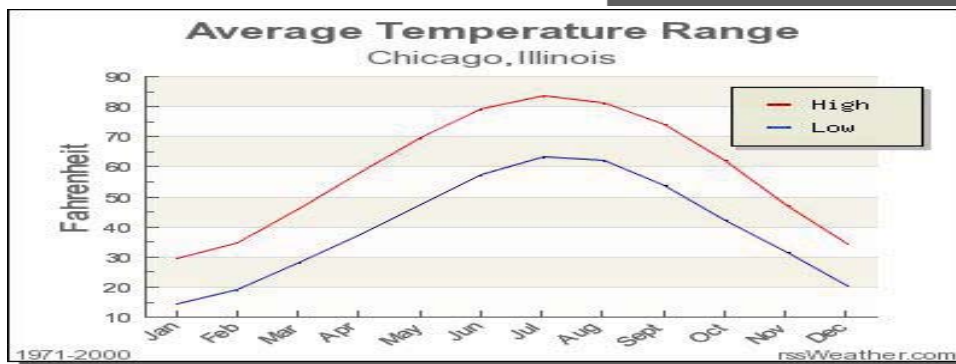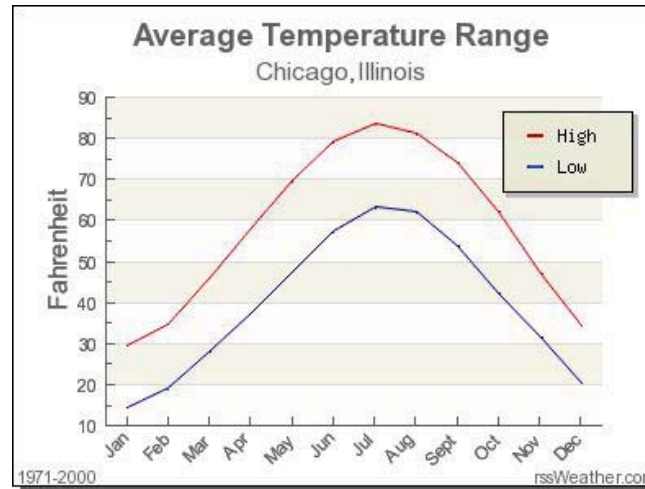






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# Other things to watch out for...

Upside down Y axis or going against conventions





**Gun deaths in Florida**

Number of murders committed using firearms

2005
Florida enacted
its 'Stand Your
Ground' law

873

721

1990s    2000s    2010s

Source: Florida Department of Law Enforcement

C. Chan 16/02/2014    REUTERS

# Other things to watch out for...

Upside down Y axis or going against conventions



**Gun deaths in Florida**

Number of murders committed using firearms

0

200

400

**2005**
Florida enacted
its 'Stand Your
Ground' law

600

800

**721**

**873**

1,000

1990s    2000s    2010s
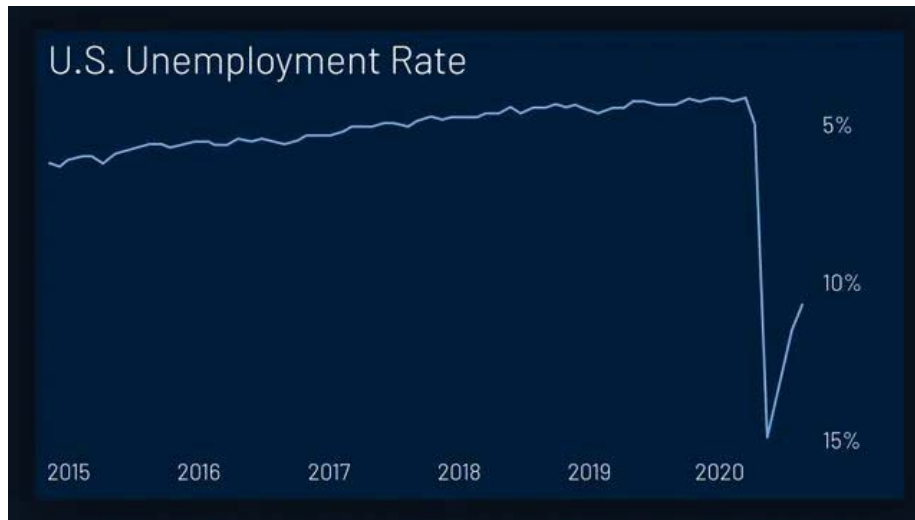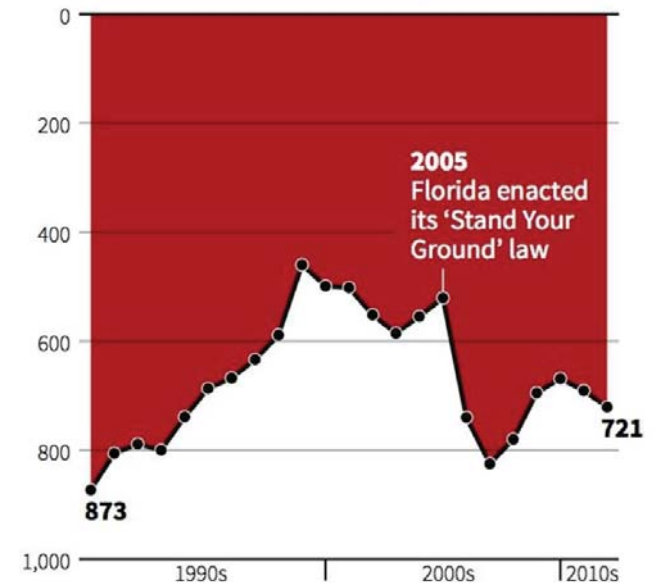
Source: Florida Department of Law Enforcement

C. Chan 16/02/2014    REUTERS
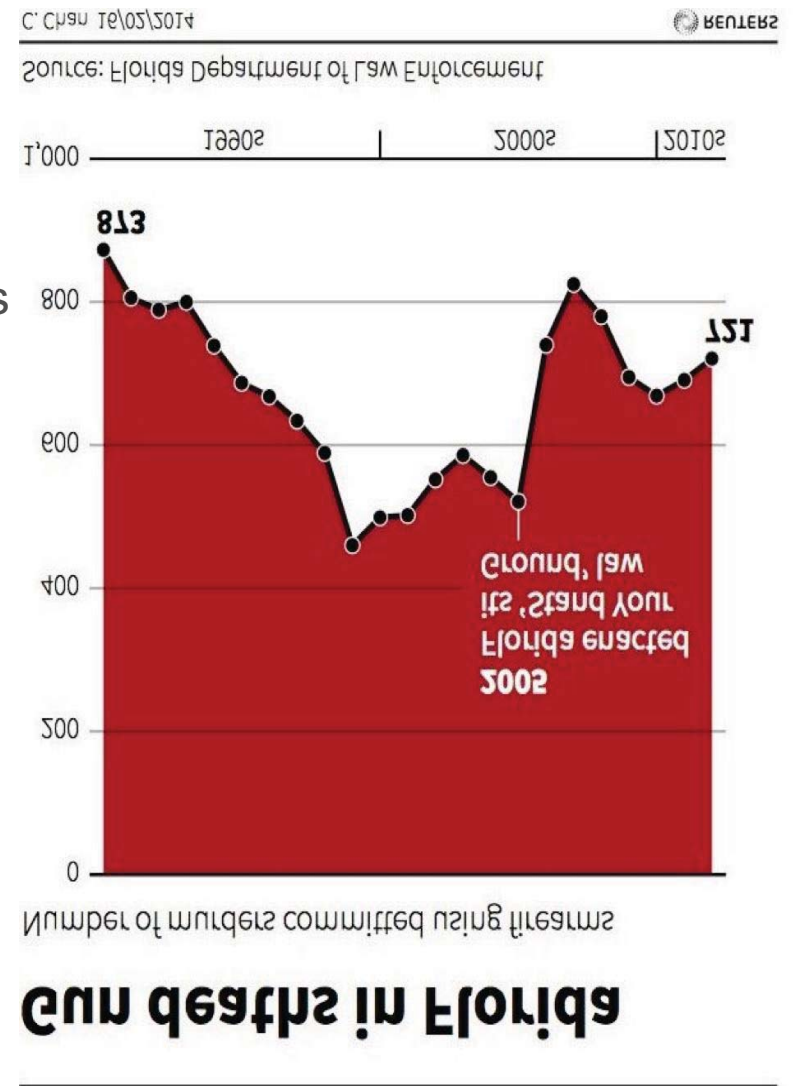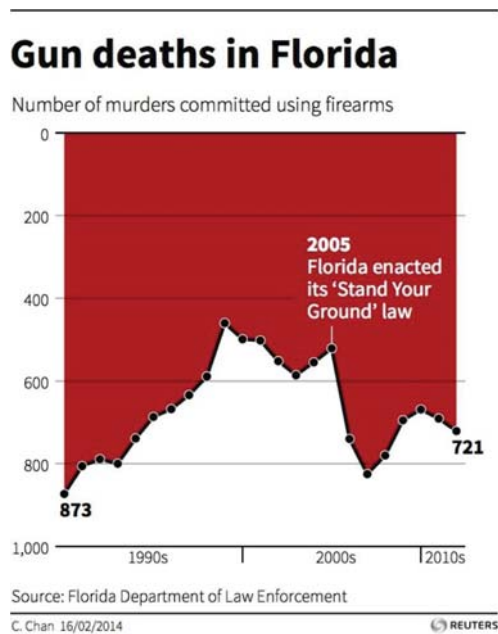
# Other things to watch out for...

Data and visual don't match
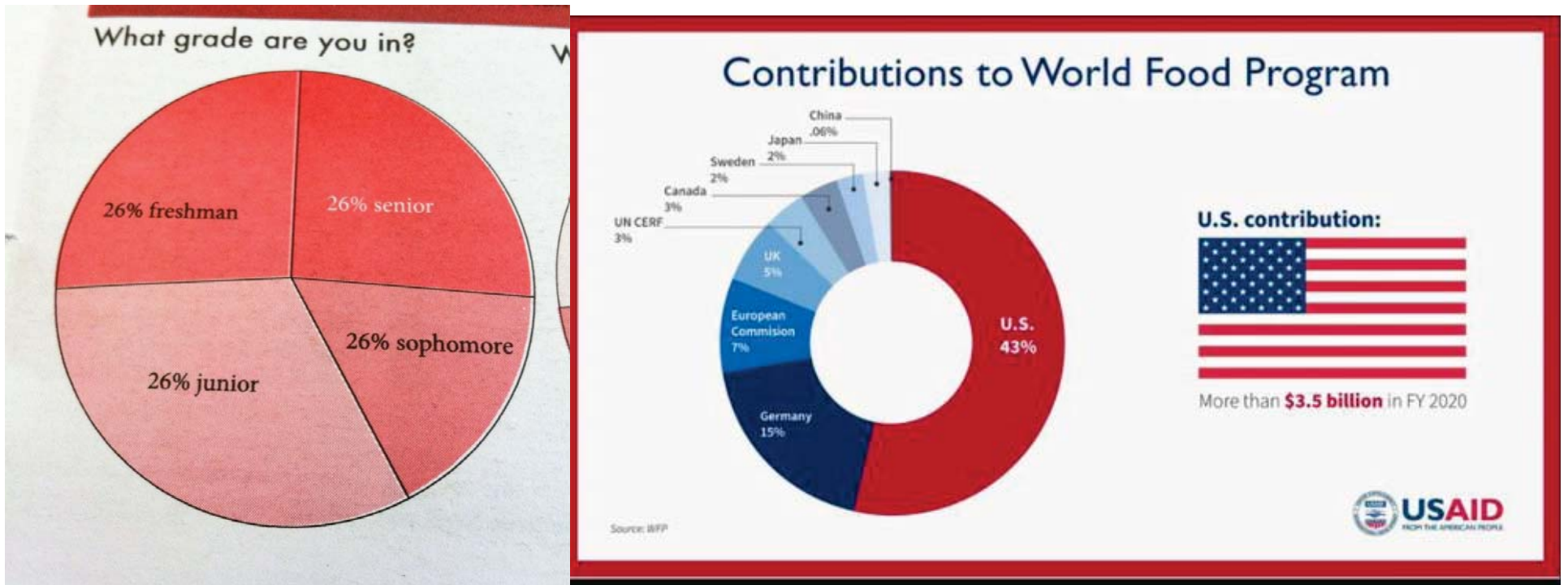
# Other things to watch out for...

Cherry picking data
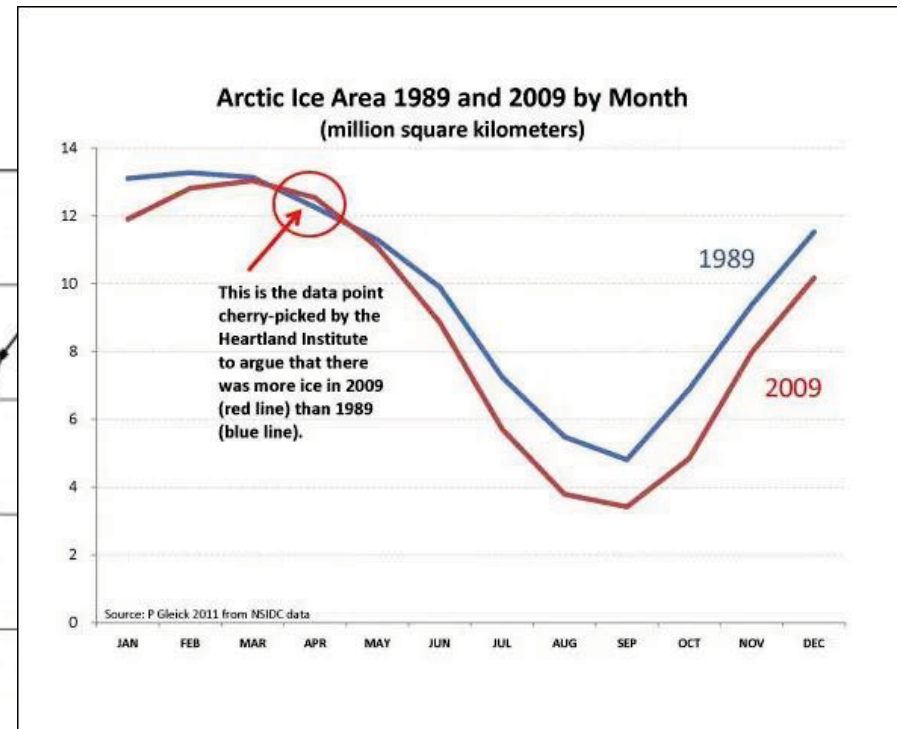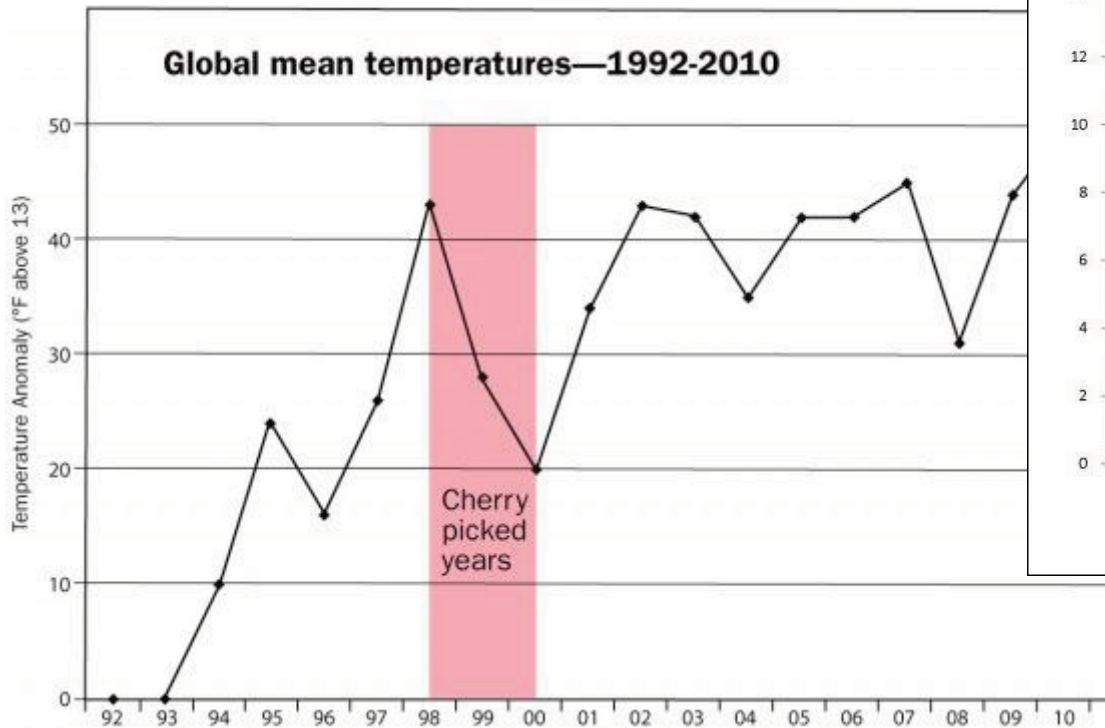
# Other things to watch out for...

Cherry picking data
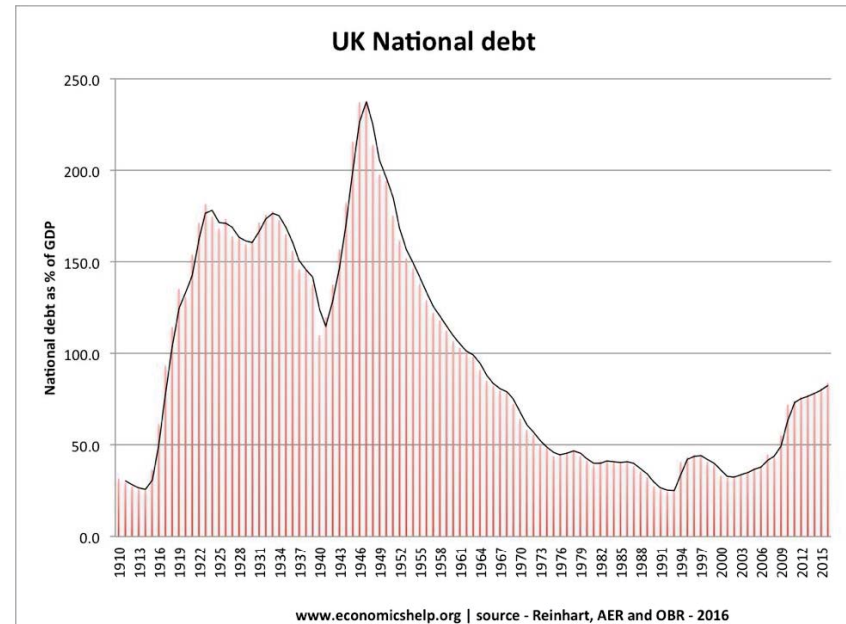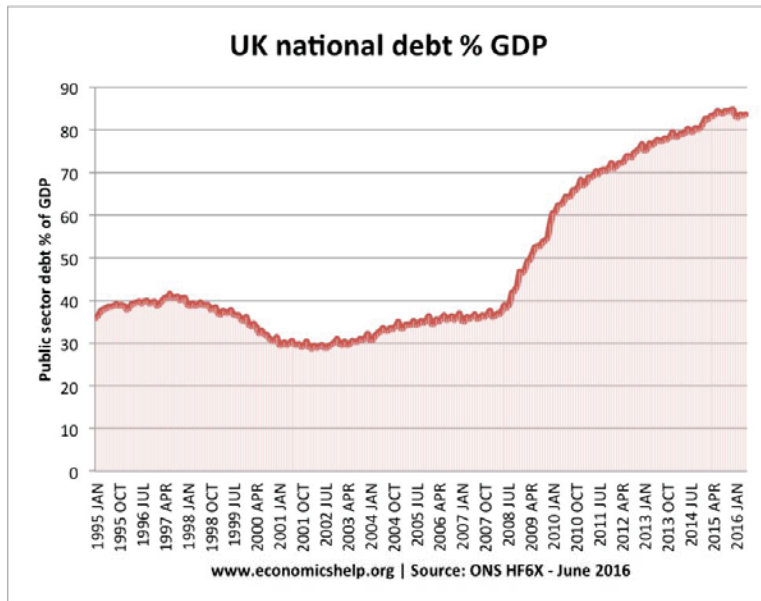
# You're a Liar!

Use global climate data - create 2 graphs, using 2 of the methods we discussed, to manipulate the data.  Explain which method you used and why (what were you trying to show/how were you trying to make the data look when you manipulated the data?

Submit on google classroom.

# Graphing Stories

Part Deux

# Seasonal Events
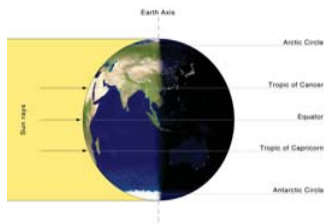


## Event 1

This event marks the end of Summer and the beginning of Fall. This day is also significant due to an equal amount of day and night.
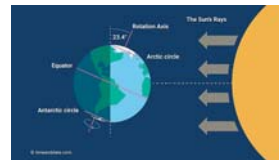


## Event 2

For the Northern hemisphere this is the longest day and marks the beginning of Summer. In the southern hemisphere it is the shortest day and marks the beginning of winter.
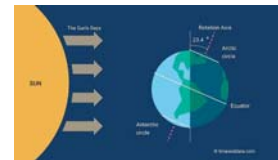


## Event 3

For the Northern hemisphere this is the shortest day and marks the beginning of Winter. In the southern hemisphere it is the longest day and marks the beginning of summer.
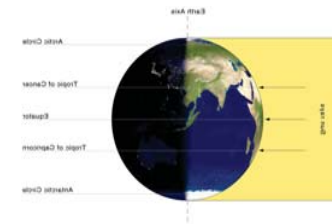


## Event 4

This event marks the end of Winter and the beginning of Spring. This day is also significant due to an equal amount of day and night.

# Length of Day

# Global Temperature Events



## Event 1

Extreme and violent volcanic eruptions help to cause a severe cool down that lasts for more than a century.

## Event 2

Poor farming practices along with ten years of unseasonable hot temperatures and a severe drought cause widespread environmental damage to the heartland of the United states.

## Event 3

Industrial practices and air pollutants finally build up enough to cause rampant, long term temperature increases that last for more than 30 years.

# The world has been getting warmer

Annual mean land temperature above or below average (°C)
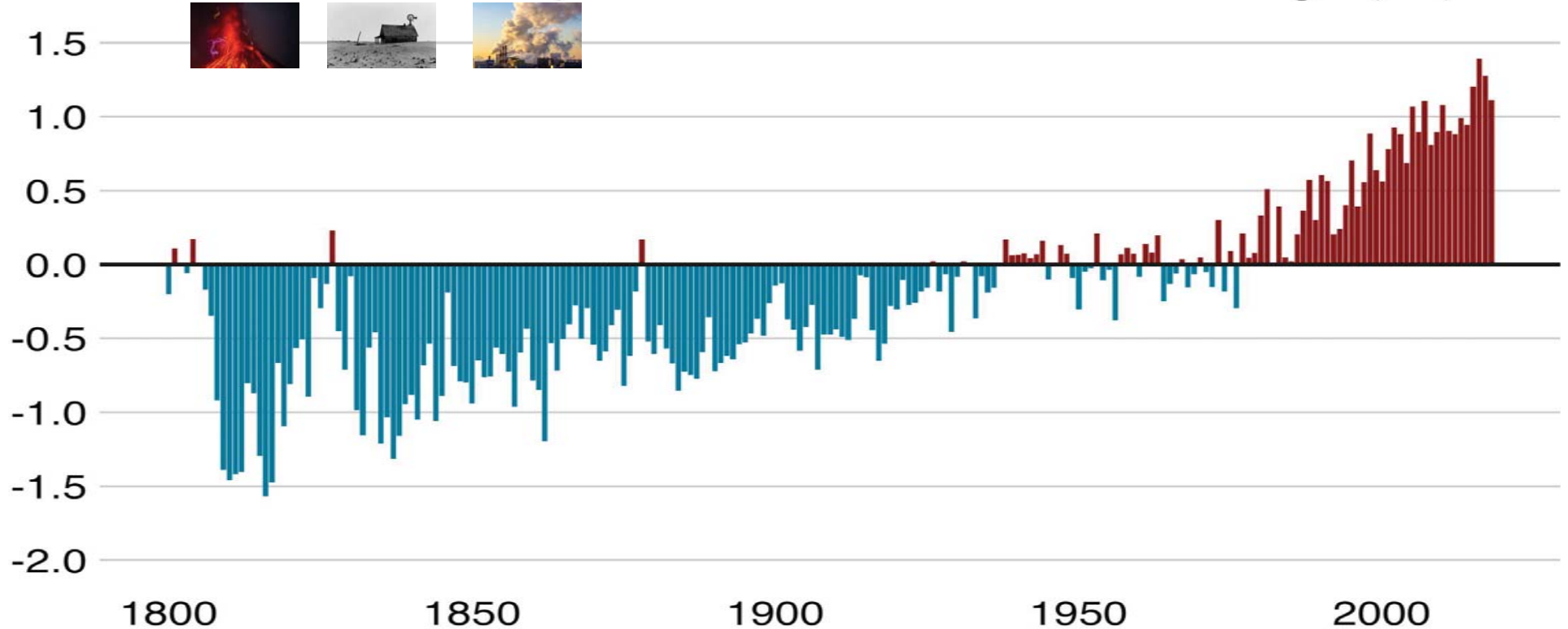
Note: Average is calculated from 1951-1980 land surface temperature data

Source: University of California Berkeley

BBC

# Global Temperature Events







## Event 1

Many who sought a safe haven from persecution during this period found their efforts thwarted by the United States' restrictive immigration quotas and the complicated, demanding requirements for obtaining visas. United States laws reflected the country's xenophobia, anti semitism, and racist beliefs of the time.

## Event 2

Immigration reaches an all new high into the united states. People across Europe decide to leave their homes due to overcrowding, crop failures, job shortages and more.

## Event 3

Economic boom and poor working/ living conditions in Central and South America cause a rapid influx of immigrants from Central and South American countries. Immigration reaches all time highs.

# Total Immigrants by Decade

This chart shows, by decade, the number of legal immigrants who came to America from 1820 through 2009.

12,000,000

10,000,000

8,000,000

6,000,000

4,000,000

2,000,000

0

128,502
538,381
1,427,337
2,814,554
2,081,261
2,742,137
5,248,568
3,694,294
8,202,388
6,347,380
4,295,510
699,375
856,608
2,499,268
3,213,749
4,248,203
6,244,379
9,775,398
10,299,430

1820s 1830s 1840s 1850s 1860s 1870s 1880s 1890s 1900s 1910s 1920s 1930s 1940s 1950s 1960s 1970s 1980s 1990s 2000s

# Graph Stories

Warm Up Activity
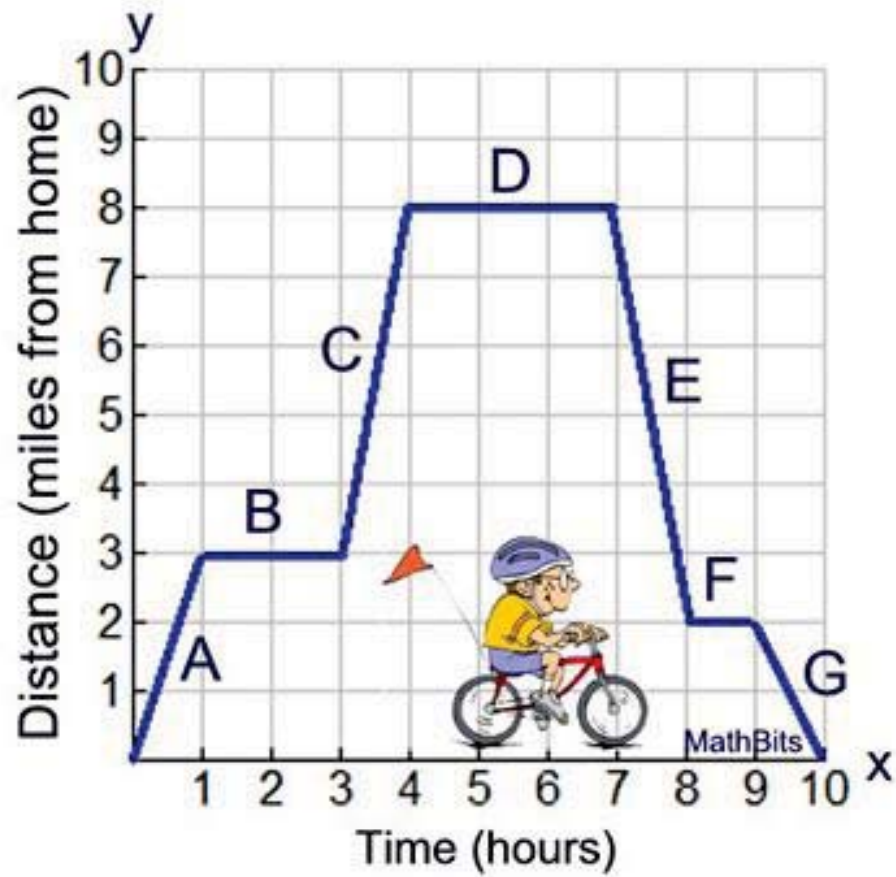
What is happening in this graph?
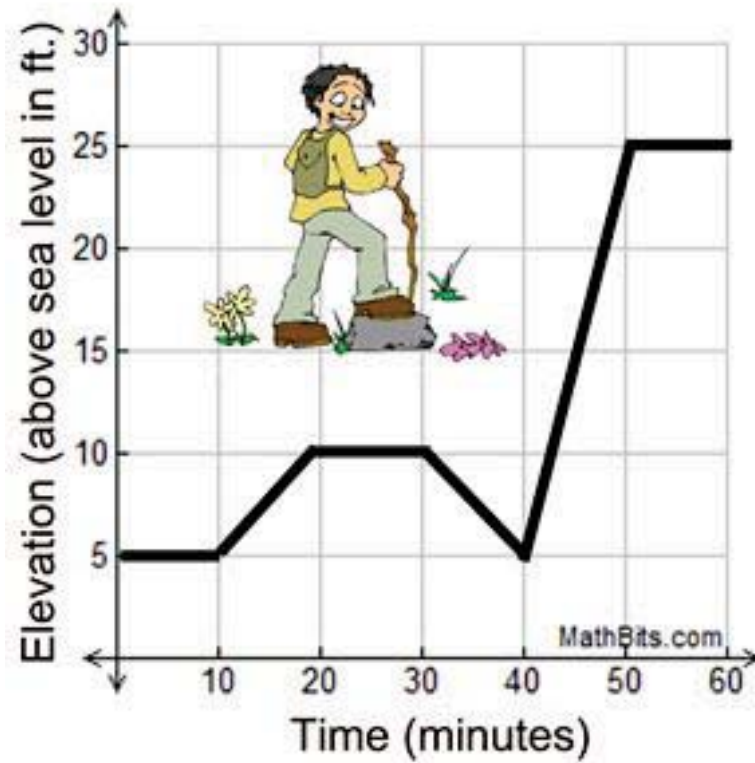
What is happening in this graph?
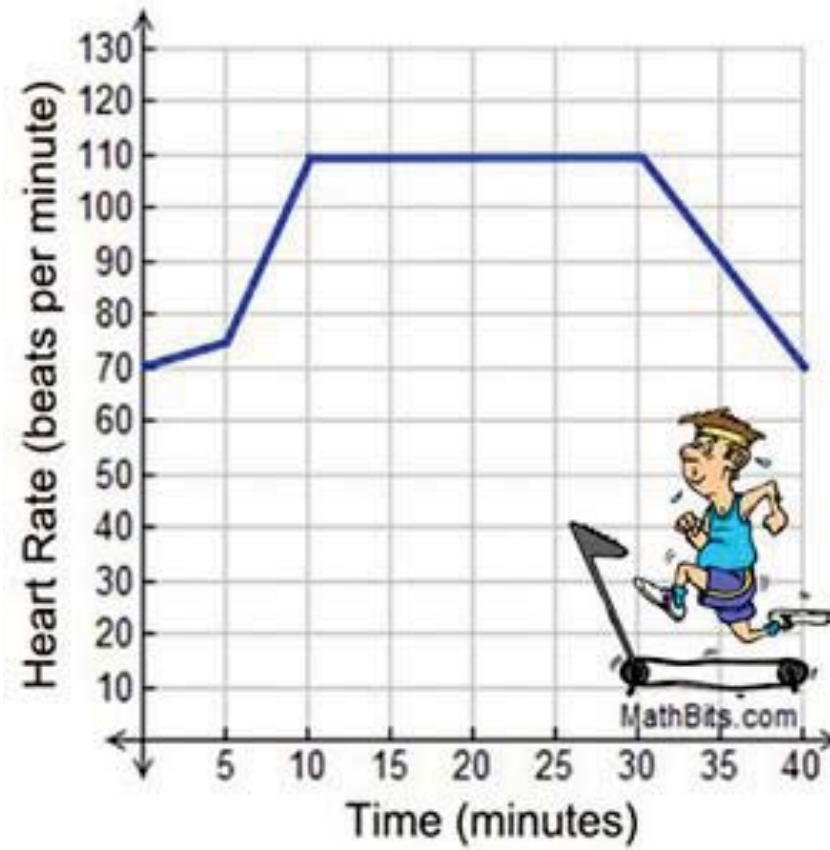
What is happening in this graph?

1.  Figure out who will be person A, B, and C
    a.  The person who woke up earliest this morning = person A
    b.  The person who woke up next earliest = person B
    c.  The person who woke up latest = person C
2.  Tell a story about a graph based on its shape. Scroll down to find a graph for each person
    a.  Take a silent moment for everyone to think about the story they will tell
    b.  Take turns telling a story about your graph
    c.  If you end up with extra time, swap graphs and think of more stories (e.g. Person A now uses Graph B, etc)

# Graph A
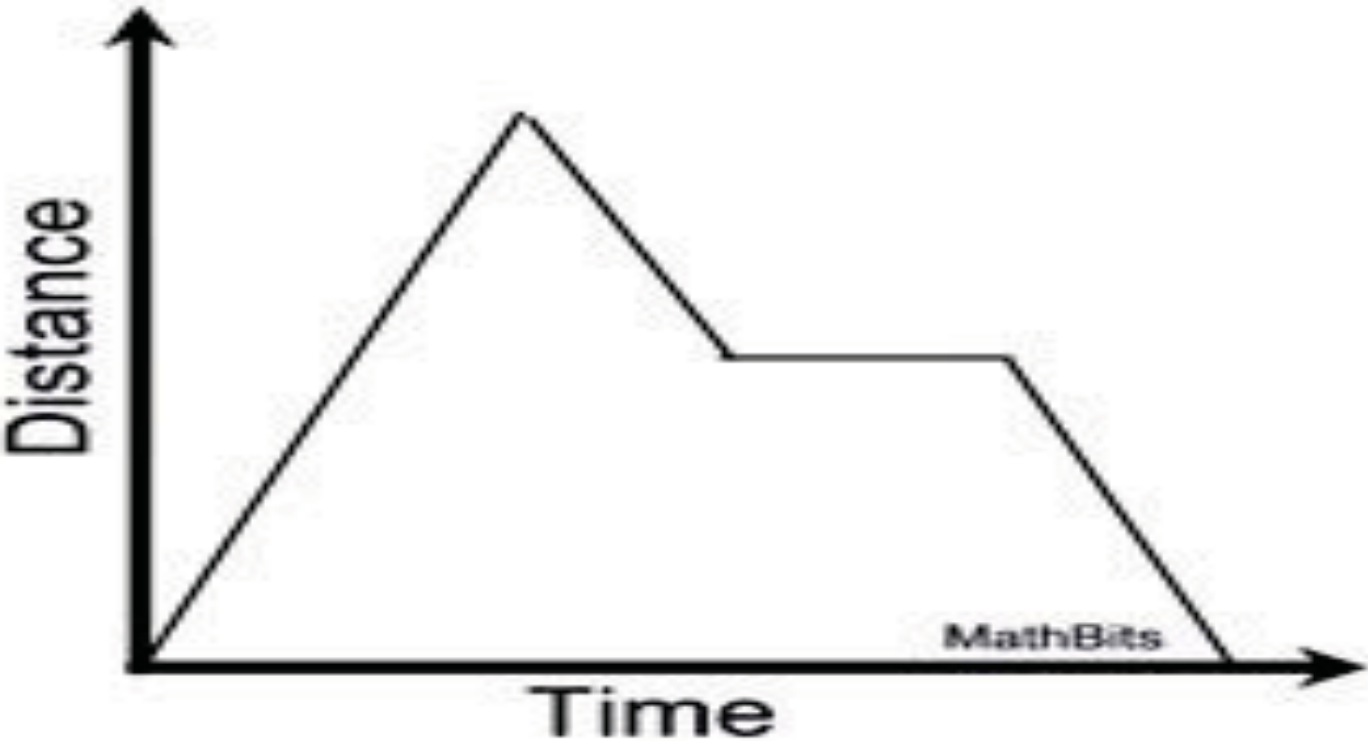
# Graphing Story B
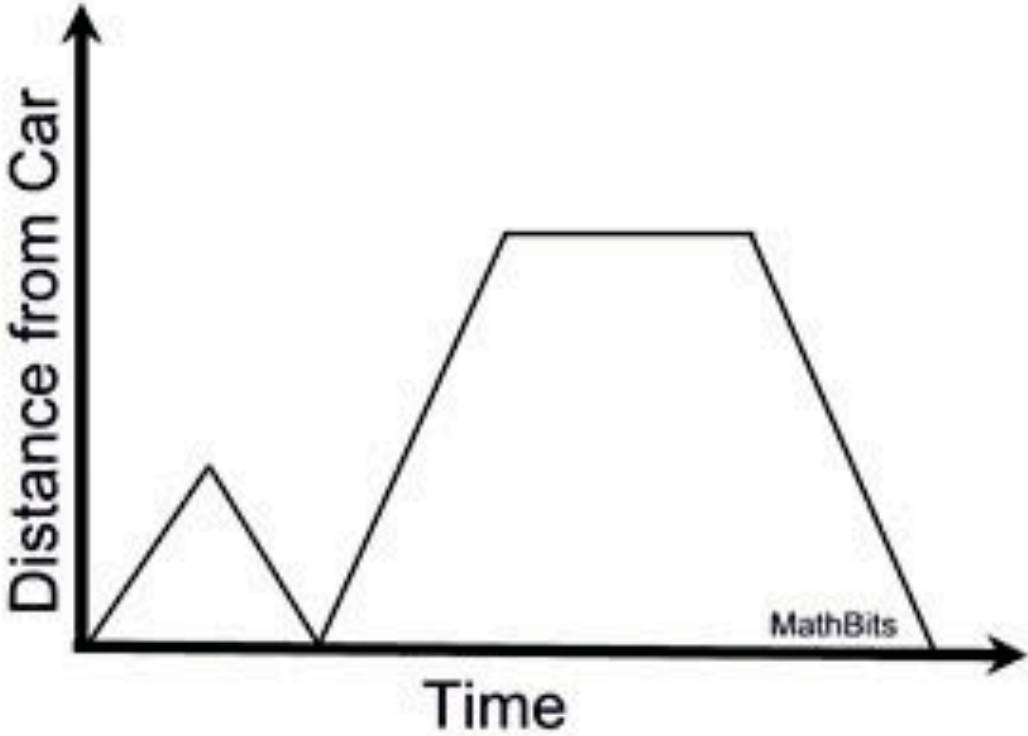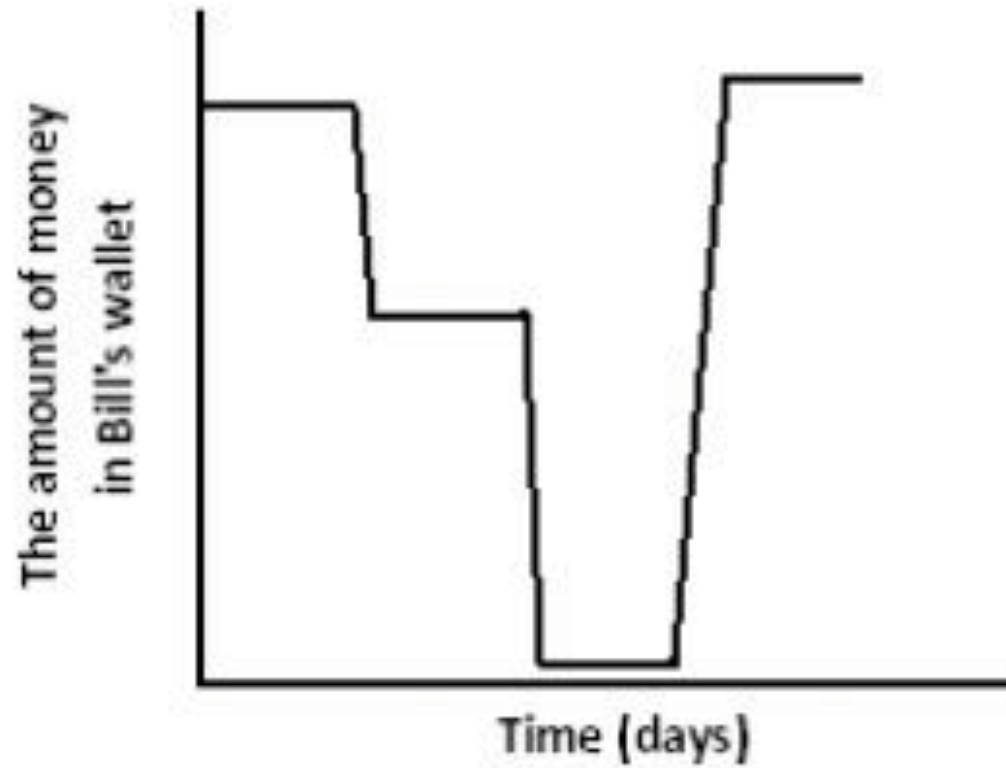
Graphing Story C
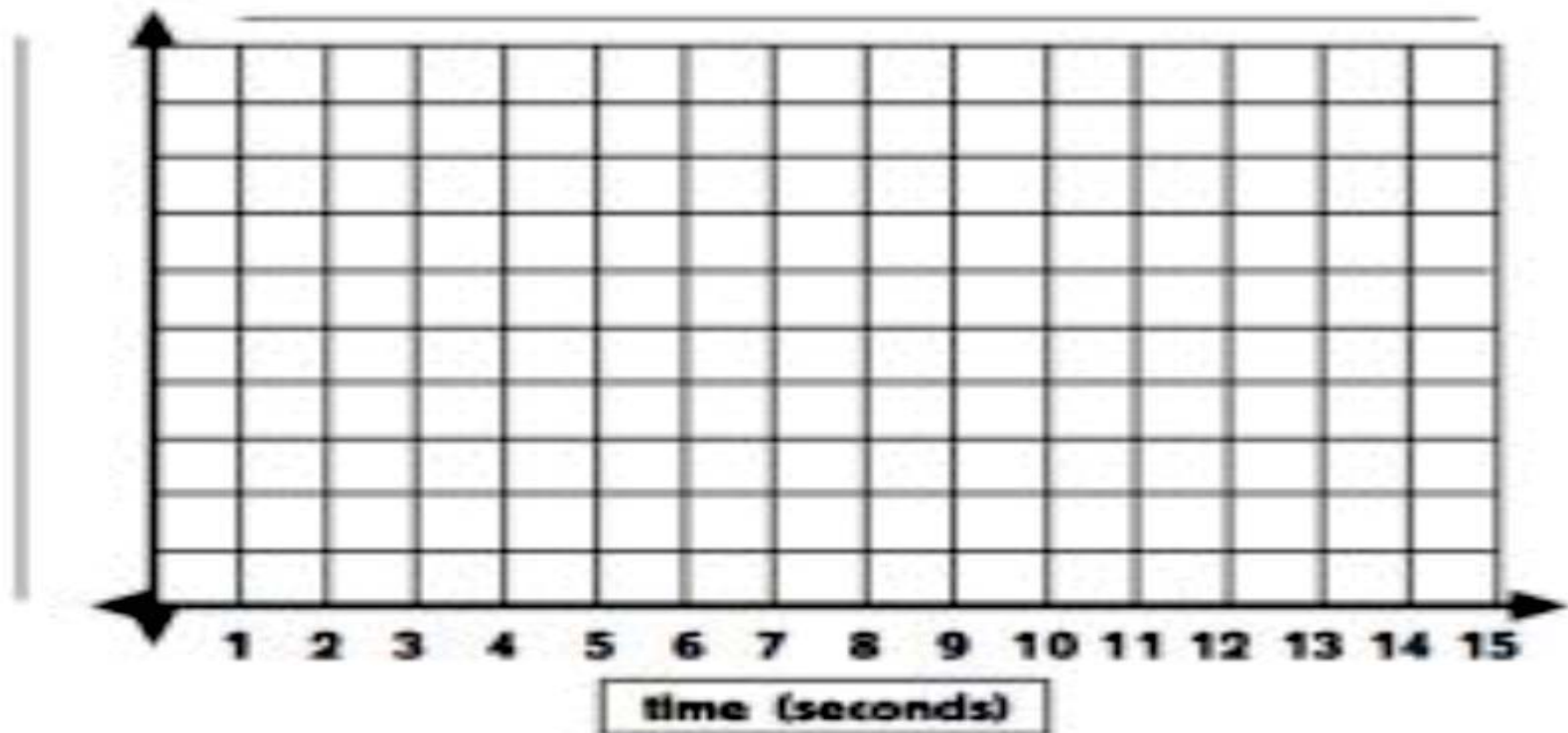
# GRAPHING STORIES

1.



time (seconds)

# GRAPHING STORIES

1.



time (seconds)
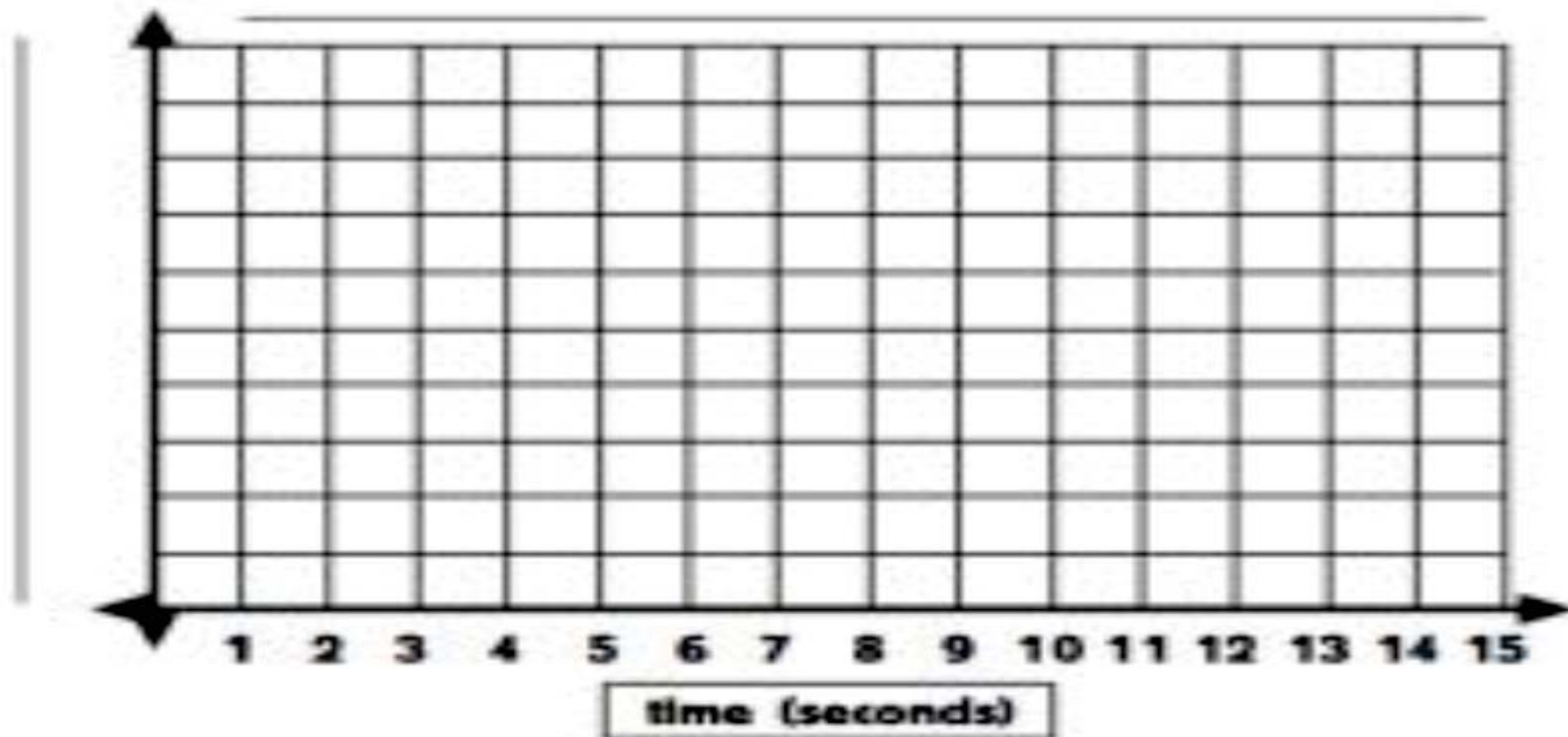
distance from home plate
liam johnston

# GRAPHING STORIES

1.



time (seconds)
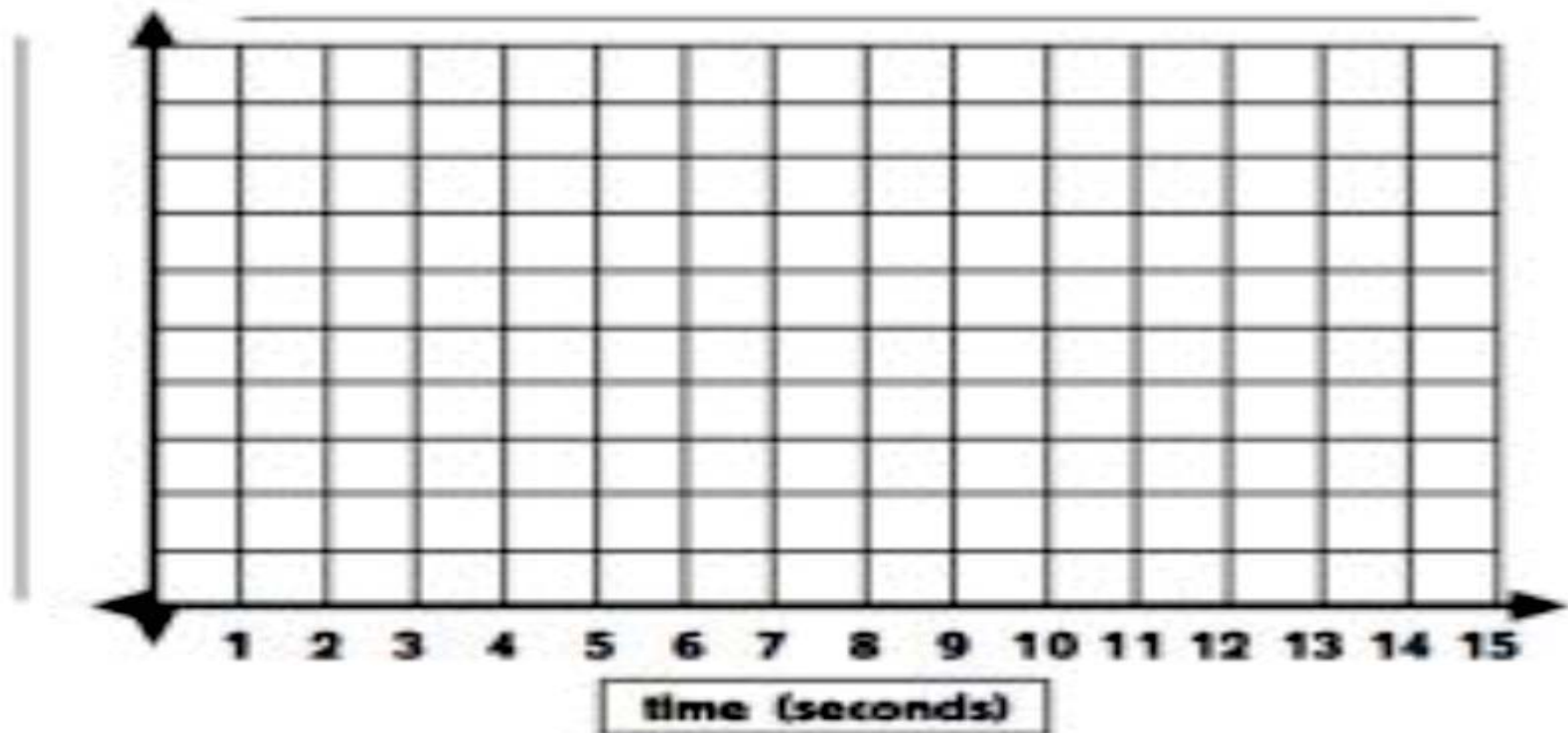
elevation
arianna hoshino

# GRAPHING STORIES

1.



time (seconds)

# GRAPHING STORIES

1.



time (seconds)
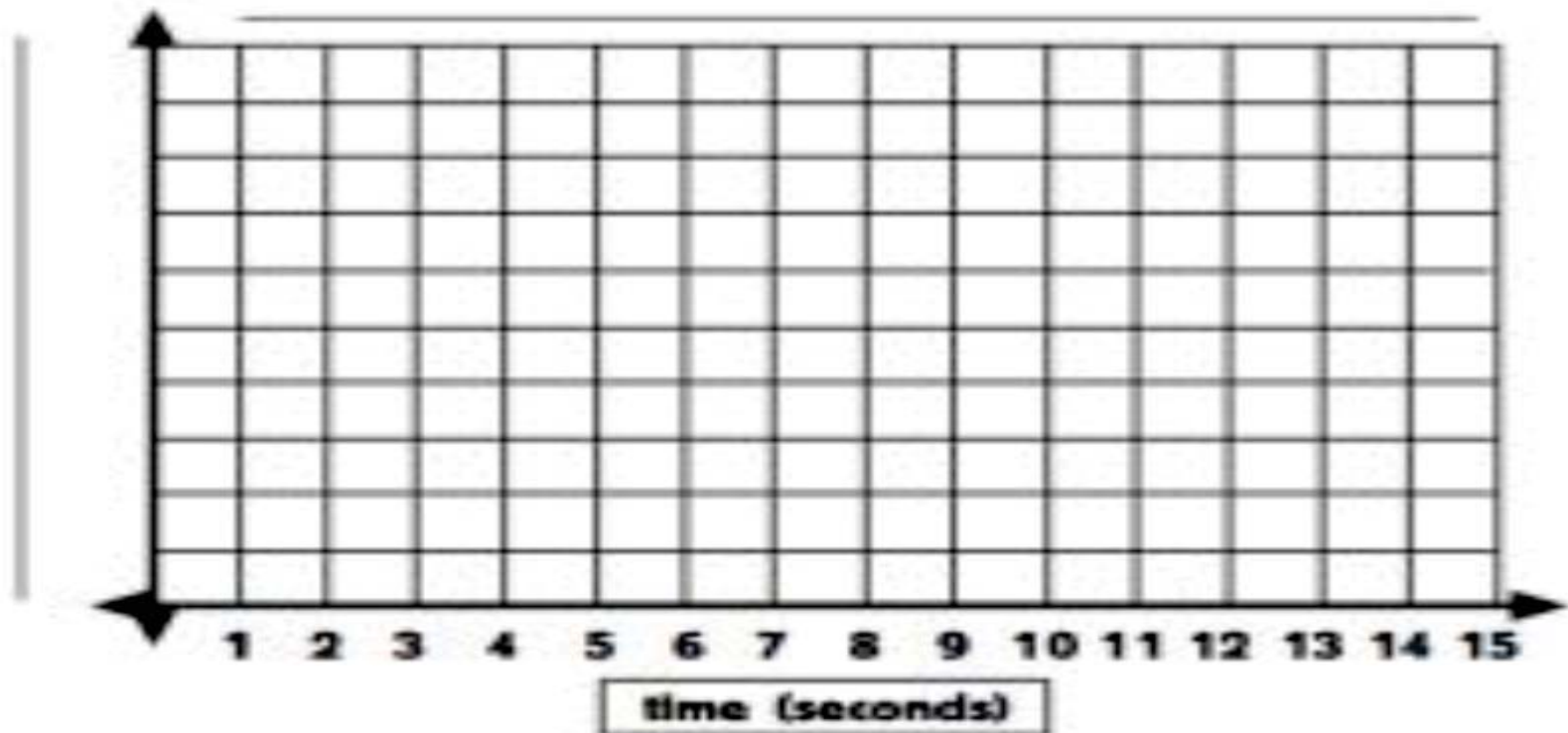
# Matching a Graph to a Story

A. Tom took his dog for a walk to the park. He set off slowly and then increased his pace. At the park Tom turned around and walked slowly back home.

B. Tom rode his bike east from his home up a steep hill. After a while the slope eased off. At the top he raced down the other side.

C. Tom went for a jog. At the end of his road he bumped into a friend and his pace slowed. When Tom left his friend he walked quickly back home.



Distance from home

Time
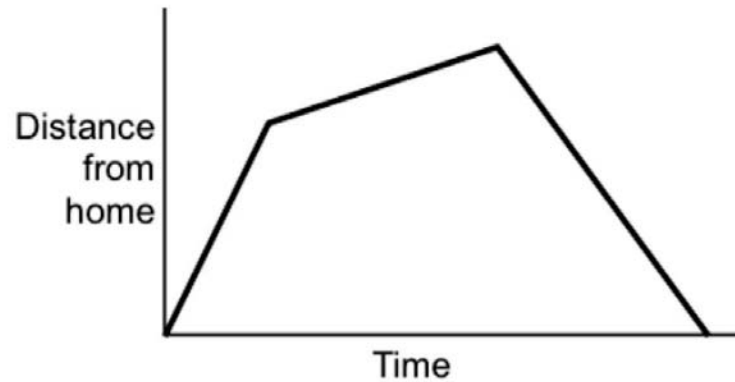
*Match the graph model to the story it illustrates.*
*Then label each axis with the appropriate variables.*

_____ 18. A parachutist is taken up in a plane.
After she jumps, the wind blows her off course.
She ends up tangled in the branches of a tree.

**A**

_____ 19. Tomas puts an inheritance in the bank and
leaves it there to earn interest for several
years. Yesterday, he withdrew half the amount.

**B**

_____ 20. Mike had to spread 30 m³ of gravel across his
driveway. On the first day, he was able to spread
half of the gravel. On the second day, he spread
half of what was left. Each day after that, he
spread half of the remaining pile.

**X**
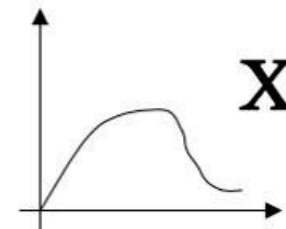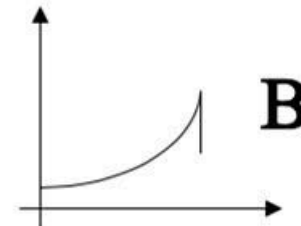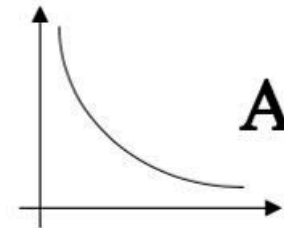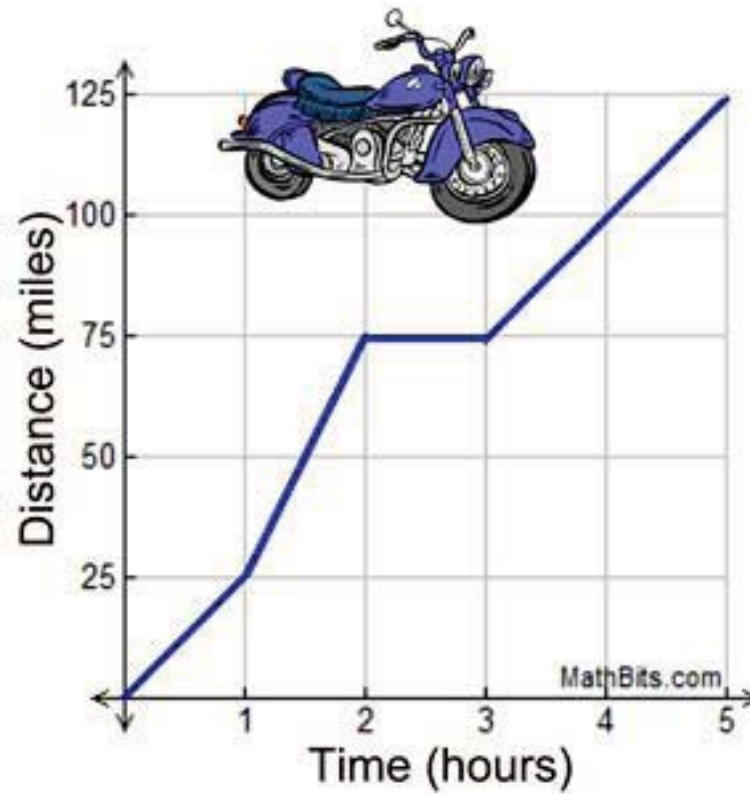
Tell the story of this graph.

## Unit 1 Industrialization & Progressive Era

## Grade level: 8

## Duration: Approximate 4 weeks

## Overview:

In this unit, students are studying the effects of unregulated Industrial growth on business, people, and the economy.  Students will also be looking at the changes made by progressives in the era in reaction to that growth.  The analogy in class is drawn to why at times even nature needs to be regulated by both natural and human methods in order to preserve the ecosystem.  The core activity in class, supported by primary and secondary source activities, is a loose factory simulation.  Students compare the experiences of those working within the cottage industry or small businesses in designing a product---a paper airplane.  Once their designs are complete, students compete to determine which one will be "mass produced" in a factory setting.

## Common Core Standards & Skills:

- Reading Like A Historian (RLAH) skills: sourcing, contextualization, close reading, corroboration
- identifying opposing viewpoints: claims and evidence
- note-taking strategies
- close-reading
- identifying point of view
- identifying main ideas

- making a hypothesis based on evidence
- making a claim based on evidence- reading for information
- inference
- evaluation of historical impact
- oral presentation and listening
- analysis of primary source written documents and images
-analyze two secondary source documents with opposing viewpoints

CCSS.ELA-LITERACY.RH.6-8.1
Cite specific textual evidence to support analysis of primary and secondary sources.
CCSS.ELA-LITERACY.RH.6-8.2
Determine the central ideas or information of a primary or secondary source; provide an accurate summary of the source distinct from prior knowledge or opinions.
CCSS.ELA-LITERACY.RH.6-8.5
Describe how a text presents information (e.g., sequentially, comparatively, causally).

CCSS.ELA-LITERACY.RH.6-8.6
Identify aspects of a text that reveal an author's point of view or purpose (e.g., loaded language, inclusion or avoidance of particular facts).
CCSS.ELA-LITERACY.RH.6-8.7
Integrate visual information (e.g., in charts, graphs, photographs, videos, or maps) with other information in print and digital texts.
CCSS.ELA-LITERACY.RH.6-8.8
Distinguish among fact, opinion, and reasoned judgment in a text.
CCSS.ELA-LITERACY.RH.6-8.9
Analyze the relationship between a primary and secondary source on the same topic.

## Essential Questions:

What are the consequences of unregulated growth?
What does it mean to be progressive? How does one initiate change?

## KEY UNIT VOCABULARY

Industrialization
Laissez-faire capitalism
Social Darwinism
Robber baron
Captain of industry
Monopoly
Trust
Labor union
Strike
Collective bargaining
Homestead Strike
Populist party
Open immigration

Recall
Secret ballot
Federal Reserve Act
Clayton Antitrust Act
17th Amendment
Women's suffrage
19th Amendment
Conservation

"Old" immigrants
"New" immigrants
Nativism
Chinese Exclusion Act
Progressives
Muckraker
Consumer protection
*The Jungle*
Meat Inspection Act
Pure Food and Drug Act
Child labor
*How The Other Half Lives*
Settlement house
Referendum

| Lesson # and Focus Question | Content | Activities | Evidence of Learning |
|---|---|---|---|
| **1.** What were the main characteristics of U.S. industrialization in the late 1800s? | - general characteristics of industrialization<br>- causes of industrialization | - image categorization **copies needed | - paragraph based on categorization of images |
| **2.** What were the <u>positive</u> effects of industrialization in the late 1800s and early 1900s? | - positive aspects of industrialization | - primary source historical reading +Three writing tips | - one page response to FQ |
| **3.** Did the problems caused by Industrialization outweigh its positive effects in the US around the year 1900? | - laissez-faire capitalism<br>- social Darwinism<br>- negative aspects of industrialization | - primary source historical reading | - graphic organizer with evaluation |
| **4.** How did Industrialization impact factory life? | -Factory life & experiences<br>-Product design<br>-Budgeting | -Paper airplane factory construction simulation | -Reflection on experiences compared to historical, contemporary labor conditions |
| **5.** Were the business leaders in the Industrial Age robber barons or captains of industry? | - laissez-faire policies<br>- Carnegie, Rockefeller, JP Morgan | -modern scenario consideration<br>-secondary source reading<br>-video | - evidence backed claim in response to focus question |
| **6.** Why did the Homestead Strike turn violent? | - rise of labor unions<br>- strike at Carnegie's Homestead steel factory | - documents: cognitive modeling/guided practice on RLAH skills<br>- primary source historical reading | - extended-answer guiding questions<br>- extension: dialog writing/ performance |
| SUPPLEMENTAL LESSON:<br>How did Chicago newspapers cover the Pullman Strike? | - the Pullman Strike<br>- media bias | - document analysis: modified jigsaw | - graphic organizer with reasoned opinion<br>- optional HW with current events connection |
| **7.** Why did the Populist Party attract millions of supporters in the late 1800s? | - Populist movement<br>- election of 1896 | - primary source documents: guided practice and analysis | - short answers to document questions<br>- paragraph in response to guiding question<br>- HW Regents Qs |
| **8.** Why did nativists oppose the United States policy of open immigration in the late 1800s and early 1900s? | - open immigration<br>- "old" immigrants and "new" immigrants<br>- nativism | - primary and secondary source historical reading | - short answers to document questions<br>- paragraph in response to guiding question |

| | | | |
|---|---|---|---|
| **9.** Why did Americans pass the Chinese Exclusion Act of 1882? | - transcontinental railroad/Pacific Railway Act<br>- Chinese Exclusion Act | - hypothesis based on timeline<br>- primary source historical reading | - graphic organizer<br>- one-page response to FQ |
| **10.** How progressive was the Progressive Era? | - Progressive Era reform movements and legislation | - short secondary source reading and interpretation | - completed Defining Progressivism worksheet<br>- short written response to focus question |
| **11.** How successful were progressives in provoking political, social, economic, and environmental reforms? | - Progressive Era reform movements and legislation | - analysis of primary source text and images<br>- jigsaw/fishbowl presentation of material | - completed guiding questions<br>- completed graphic organizer<br>- Regents multiple choice questions |
| **12.** What was life like in American cities during the Progressive Era? | - photographs and writings of Jacob Riis<br>- motivations of Progressive Era social reformers | - analysis of primary source photographs<br>- primary source historical reading | - written responses to guiding questions |
| **13.** How did the actions of the women's suffrage movement lead to the 19th Amendment?<br><br>(2-day lesson) | - women's suffrage movement<br>- 19th Amendment | - students create timeline using primary source documents<br>**copies needed | - responses to guiding questions<br>- 1-2 paragraph response to focus question using documents |
| **14.** Was the United States government a positive force in working to solve the social, political, and economic problems caused by industrialization? | - Unit assessment | - multiple choice questions<br>- document graphic organizer<br>- essay | - argumentative essay based on documents and knowledge of the period |

# Industrial Revolution Simulation

*Students provided the opportunity to design their own product in "cottage industry" environment: handmade and given time to comfortably create a paper airplane of their own. They must keep various costs in mind as they design the paper airplane and reflect upon how they created their paper airplane. Students then go through a minor "competition" to determine who has the most demanded product (2-6 paper airplanes, depending on size). Groups then will determine what is the most cost efficient method of creating the highest number of paper airplanes before creating one plane in a factory environment. Following this, they are given semi-similar conditions of a factory to be provided a first-hand account of what factory life was like.*

## Industrial Revolution Simulation Instructions:

### Set up:
1) Set up the supplies throughout the room with clear signs that are able to be read. Before starting the activity, instruct the students that there will be 2 minutes of cleanup time available and that the room needs to be put in order when everything is done. If necessary, designate one student to be the "Assistant manager" who will keep track of time.

iPad should be set up on the stand. Change settings so it remains on the "paper airplane" app.

Hook: Refresh with students what the cottage industry and factory systems were. Ask for positives and negatives of each.

Guided learning:
Cottage industry:
Distribute reflection sheets and cost reports. Explain how the cost report works using overhead. All costs must be included. Explain that there will be a competition for best paper airplane, and if your costs are not accurate, you will be disqualified. Explain that you are able to use some printed paper airplane instructions.

Go over reflection questions.

Independent learning:
Paper airplanes require student name and period number!!
Provide at least 15 minutes for students to make paper airplanes and begin. Allow students to move about the room as they need for materials.

Periodically check in with students and ask them questions related to their design. Reinforce that they need to create something that needs to be appealing to others for various reasons. They also need to keep track of how they created the paper airplane.

At the end of the time, proceed to clean up. Ask students to respond to reflection questions. If time allows, discuss with the class how they felt the process went.

Day 2:
Hook: Ask students what are the most important qualities of a paper airplane. Guide them to looking at least two factors: Distance and looks. The last quality could be construction or cost. State that we will be going through a testing phase to generate market interest in the products and see which will be bought by a factory for mass production. Whoever has the best planes will be in charge of their own factory for production.

First test: Distance. Bring students into the hallway. Have them throw one by one to see who has the best paper airplane. Take throwing ability into consideration and allow more than one throw.

After the student(s) with the best distance are settled, return to the room. At this point, you have to have the students vote on the next two chosen qualities a paper airplane should have. After these two rounds of voting, have the appropriate number of paper airplanes chosen per group.

At this point, have students finish reflection questions up to "Assembly Line Simulation 1".

Instruct the students that in order to mass produce their paper airplanes, the cost has to be lowered to pay more employees. They must modify the paper airplane in order to lower the cost but still maintain enough quality that consumers would still by the paper airplane. As a group, under the guidance of the creator of the plane, the students will have to make a plan to lower the cost. They then will have to divide themselves up into specific and separate roles involved in the creation of the paper airplane. The creator must supervise the final product. Have them answer the applicable reflection questions.

The group should then be allowed the remaining time to create the paper airplane under easy circumstances. They should work out a proper strategy as they do this and times themselves to see how quickly they can complete one of appropriate quality.

The students should then answer any applicable reflection questions.

Day 3:
Students are instructed to return to their assembly lines. They are told they need to create a certain number of planes in a given amount of time in order to meet the demand. If they fail, they will all be fired.

Factory rules are given:

1) Not talking to your neighbor.
2) Only the supervisors are allowed to talk.
3) Any wasted or dropped materials will be counted against the group.
4) Any off task behavior will be counted against the individual, by penalty of being fired.

At this point, lights should be turned out and the blinds should be mostly closed. Loud music can be played to simulate rougher conditions in a factory.

Instruct students before and during the simulation that they have suffered injuries: one arm, one leg, one eye, back injury, etc. They have to keep up with the pace of workers or they will be let go.

Give the students only 10 minutes to complete a certain number of airplanes.

Be short with students: try to mimic conditions of a factory with uncaring bosses.

After the time limit is over, judge each of the planes completed.

Briefly discuss the various differences in the stages of the simulation.

Show Apple Factory video.

Allow students time to complete reflection questions.

## **Paper Airplane Cost Report**
Maximum Cost: $_____

Capital Goods     Cost               Check if used     Total Cost

| Construction Materials | | | |
|---|---|---|---|
| Paper airplane instructions | $4.00 | | |
| Use of Scissors | $2.00 | | |
| Staples | $0.10 each | | |
| Folding | $0.05 each fold | | |
| Use of scotch tape | $1.00 | | |
| Use of masking tape | $1.35 | | |
| Paperclips | $0.30 | | |
| Paper | $1.25 per sheet | | |
| Desk work space | $5.00 | | |
| **Color Application** | | | |
| Red Marker | $0.70 | | |
| Blue Marker | $0.50 | | |
| Yellow Marker | $0.20 | | |
| Green Marker | $0.45 | | |
| Brown/Black Marker | $0.50 | | |
| Any other color marker | $0.40 per color | | |
| Use of Pen (any color) | $0.10 per color | | |
| Use of regular pencil | $0.05 | | |
| Use of Colored Pencil | $0.15 per color | | |
| | | **Total Cost:** | |

*If there is another construction material you would like to add, it must be approved and cost out by the contractor, Mr. Flood.

Key Terms:

Capital:  Capital resources are any goods that are used in the production process to produce a good or service.
> **Example**:

Profit:  A financial gain.  The difference between the amount earned and the amount spent in buying, operating, or producing something.

Supply and Demand: Economic law that supports determining the price of a good.  Supply is the quantity available of a good and the demand is the quantity that consumers will purchase.

1. If demand increases and supply remains unchanged, a shortage occurs, leading to a higher product price.
2. If demand decreases and supply remains unchanged, a surplus occurs, leading to a lower product price.
3. If demand remains unchanged and supply increases, a surplus occurs, leading to a lower product price.
4. If demand remains unchanged and supply decreases, a shortage occurs, leading to a higher product price.

**Cottage Industry Simulation:** an industry whose labor force consists of family units or individuals working at home with their own equipment

**Before Making the Airplane**

1.  What makes a good paper airplane?

2.  What qualities do you think people would want in a paper airplane that they would buy?

3.  What qualities do you want to make a paper airplane more functional?

4.  What qualities are you going to try to have present in your paper airplane?

5.  What do you think are the most important capital goods you will need for making the airplane?

**During & After Construction:**

1.  How did time impact your construction of the paper airplane?

2.  What was difficult about constructing your airplane?

3.  What advantages do you think you had? Were there any disadvantages?

4.  What advantages do you think others had? Do you think others had disadvantages?

5.  Do you think, at the rate you make the paper airplane, it would be easy to make a profit? Why or why not?

**Factory Simulation:** The main characteristic of the factory system is the use of machinery, originally powered by water or steam and later by electricity. Other characteristics of the system mostly derive from the use of machinery or economies of scale, such as the use of unskilled labor, division of labor, the centralization of factories, and the standardization of interchangeable parts.

**Assembly line simulation 1:**
1. In order to pay the salaries of the factory employees, the maximum cost of production for your paper airplane has been reduced even though it will be sold at a similar price. You will have to make modifications that may enhance or lessen the quality of the plane. What will your group do to minimize costs but still maintain a relative level of quality?

2. Your group must also determine a method to incorporate all of your group members to make the paper airplane. As this is a new factory, you are to create a prototype paper airplane through an assembly line to determine if your group's construction strategy will work. What is each group member doing?

   Supervisor:
   Line lead:
   Line workers:

3. Do you think the paper airplane retains the same level of quality as the first item? Why or why not?

4. Did your assembly line system work? Why or why not? What were conditions like after you were done?

**Assembly line simulation 2:**

**After simulation:**
1. Your group now had to make many paper airplanes in a short amount of time. What were some challenges that you faced? What were challenges your group faced?

2. After the simulation, what did you feel were the primary concerns of factory workers and the factory owner?

3. How does this impact the lives of workers and conditions of the factory?

Concluding Question:

How does technology and innovation impact the human factor in production? Cite specific examples.

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Do you believe the Industrial Revolution to have been a wholly negative or positive event? Use the stations for specific examples.

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_____

<u>Ledger</u>

Cost of each airplane: _____

Sale price of paper airplane: _____

Quota: _____

Number of Line Workers: _____

Wage for Line Workers: _____

Number of Project Managers: _____

Wage for Project Managers: _____

Number of Line Leads: _____

Wage for Line Leads: _____

Work spaces used: _____

Cost per work space: _____

Total cost of work spaces: _____


Total Costs: _____

Profit Goal: _____


Number of completed airplanes: _____

Net Profit: _____

K-4th Spanish - 2nd Grade Unit of Study

Lisette Roman- Ahlgrim - Spanish
Lesson - "Los animales"
Grade level - 2nd grade

| Standards | 28.B.5A -Imitate sounds and words

28.B.1D - Ask learned questions spontaneously in familiar contexts.

28.D.1A-  Copy words and phrases in the target language.

28.D.2A- Categorize words based on meaning. |
|---|---|
| Objective | Students will learn words for various types of animals

Students will be able use phrases and implement their vocabulary words.

Students will be able to identify which animals could be found in which landform using previous vocabulary words. |
| Materials | Whiteboard
Notebooks
Slides
Index cards/ flashcards
Drawing materials
Music |

1. Write vocabulary in Spanish on the white board using chromecast for both in class and remote students.

2. Allow three guesses for each word.

3. Write the correct translation next to the Spanish words.

4. Have class go over vocabulary words and imitate animal sounds or act out animals.

 5. Copy words from the board into their notebooks.

6. Pass out vocabulary/flashcard sheets and have students cut and paste unto their index cards.

7. Have children identify which landform could certain animals be found using previous landform vocabulary.

9. Play a game of pictionary.  Teacher will draw a picture and have kids guess what animal is being drawn.  Students will also have the opportunity to play with each other.

10. Using the animal sounds and vocabulary the children created a "rap song".  Students  write their Spanish vocabulary words and then "sing "  their sounds.

11.  Assess the students at end of unit.

Vocabulary list:

Los animales/ mascotas

el perro - dog
el gato - cat
el pajaro - bird
la vaca - cow
el caballo - horse
la gallina - chicken
el elefante - elephant
la jirafa - giraffe
la rana - frog
la tortuga - turtle
la  hormiga - ant
el gusano - worm
la abeja - bee
la garrapata - ticks
la araña - spider
el saltamonte - grasshopper
la mariposa - butterfly
el coyote - coyote
el zorrillo - skunk
el venado - deer
el oso - bear
el mono - monkey

Activities:

1. Have students make their own flashcards.

2. Pass out worksheets to work with vocabulary words.

3. Show slides through google chromecast.  and play two seperate games.
   a) Name the animals
   b) Where would you find this animal?

4. Play game -  Pictionary


5. Create a rap song, using animal names and sounds.

# Los animales



el gato

el perro



el conejo

el pajaro



la vaca

# el caballo



# la gallina

# la abeja



# la araña

la hormiga

el gusano

# el venado



# el oso

# el elefante



# la jirafa

# la rana



# el cerdo

# la garrapata





# el saltamonte

# la mariposa



# el coyote

el zorrillo

# la tortuga



# el mono

5th-8th Spanish - 7th Grade Unit of Study

Jana McGeever - SPANISH LESSON

Lesson Plan: Ser/Estar

Lesson Name: Irregular verbs Unidad 5 Lección 1

Grade Level: 7th grade

| | |
|---|---|
| Standards | 28.A.1A Understanding oral communication. Recognizing language patterns. 28.A. 3A Comprehend main messages. Understand in oral presentation. |
| Objective | My objectives for this lesson are for the students to know the proper conjugations for ser/estar and be able to choose the appropriate verb in reading, writing, and speaking. |
| Concepts | Present tense conjugations of the verbs SER and ESTAR, understanding the difference between the two verbs, vocabulary review. |
| Materials | -whiteboard/markers<br>-flashcards<br>-poster sheets<br>-book<br>-worksheet-<br>-chromebook<br>- packet of worksheet activities/games |
| Procedure | -Review SER and vocabulary we used with SER.<br>-Review ESTAR and vocabulary we used with SER.<br>-Students will note the differences between the two verbs.<br>-Write the acronyms "d.o.c.t.o.r." and "p.l.a.c.e." on the board and give the words for each letter that help differentiate the two verbs.<br>-Assign the verbs to groups of 3-4 students. The groups will make a poster about their verb.<br>-Students will present their posters to the class.<br>-The class will do writing, listening, and speaking activities related to |

| | |
|---|---|
| | SER/ESTAR.<br><br>-Students will complete the packet of activities/games for the lesson. |
| Assessment | The posters will show the correct forms of the verbs.  Complete sentences with the verbs will show understanding.  Oral assessment of student progress and understanding will happen on a daily basis throughout the lesson.  Completion of the activities will prove understanding.  At the end of the unit there will be a QUIZ  which will include all modes of learning as well. |

Packet of exercises/games:

# Cerradura 1

1. The girl is at the park.
2. Valentina is very worried about the test.
3. My teacher is from Brazil.
4. It is three o'clock in the afternoon.
5. We are swimming in the lake.
6. My mother is smart and strong.
7. The door is open.
8. Shakira is Colombian.
9. You are happy today.
10. Santiago and Martina are dentists.
11. That is Thiago's homework.
12. I am sick.
13. The grandmother is short with white hair.

Ser          Estar

El Código:
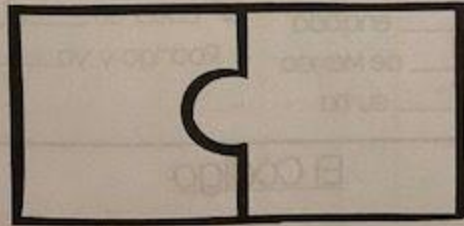
# Cerradura 2

| Ser | Estar |
|---|---|
| | |

- Las chicas _____ altas.
- Alejandro _____ de Guatemala.
- Mi madre _____ maestra.
- Cara y yo _____ nadando.
- La esposa _____ enojada.
- Ernesto _____ de México.
- Juana _____ su tía

- Ana y Juan _____ enfermos.
- Olivia _____ muy interesante.
- Susana _____ en la cocina
- Eduardo _____ al museo.
- Rodrigo y yo _____ amigos.

## El Código:

_ _   _ _ _ _ _   _ _ _ _ _

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300

A B C D E F G H I J K

L M N O P Q R S T U V

W X Y Z

| A | .- | L | .-.. | W | .-- |
|---|-----|---|------|---|-----|
| B | -... | M | -- | X | -..- |
| C | -.-. | N | -. | Y | -.-- |
| D | -.. | O | --- | Z | --.. |
| E | . | P | .--. | | |
| F | ..-. | Q | --.- | | |
| G | --. | R | .-. | | |
| H | .... | S | ... | | |
| I | .. | T | - | | |
| J | .--- | U | ..- | | |
| K | -.- | V | ...- | | |

El Código: _ _ _   _ _ _   _ _ _ _   _ _ _ _

_ _ _ _ _   _ _ _ _

# Cerradura 4

## Verbdoku 1

| | | | | | |
|---|---|---|---|---|---|
| es | | | | | somos |
| | | somos | es | | |
| | es | | | sois | |
| | somos | | | soy | |
| | | son | soy | | |
| soy | | | | | eres |

## Verbdoku 2

| | | | | | |
|---|---|---|---|---|---|
| están | estás | | estoy | | |
| | | | | | están |
| está | | | estás | estoy | |
| | estoy | estás | | | está |
| estoy | | | | | |
| | | está | | estamos | |

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QUIZ:

Nombre _____
Fecha _____
Clase _____

55

Escribe las formas de los verbos. (10 pts.)

SER

ESTAR

Write the words that make up the following ACRONYMS. (11 pts.)

D                          P

O                          L

C                          A

T                          C

O                          E

R

Complete the following sentences describing different household items or rooms.
Choose the correct form of ser or estar. (8 points)

1. Mi cuarto _____ (es / está) pequeño.
2. Las ventanas _____ (están / son) al lado de la cama.
3. El radio _____ (es / está) en el escritorio.
4. Las cómodas _____ (están / son) azules.

5. La cocina _____ (es / está) en el primer piso.
6. El sofá _____ (es/está) feo.
7. El sillón _____ (es/está) cerca del la televisión.
8. La lámpara _____ (es/está) de Chile.

**Complete the following sentences with the correct form of SER or ESTAR.** (10 pts.)

1. Nosotros _____ en la sala.
2. La lámpara _____ de Quito.
3. Los jardines _____ bonitos.
4. Yo voy a mi cuarto porque _____ cansado.
5. Ellos _____ en la cocina.
6. _____ las seis de la tarde.
7. Mi casa _____ al lado de su casa.
8. Luis _____ alto.
9. El libro _____ encima del escritorio.
10. Mi madre _____ una maestra.

**Answer the following questions in complete sentences in SPANISH.** (6 pts.)

1. ¿Cómo estás? _____
2. ¿Cómo eres? _____
3. ¿De dónde eres? _____
4. ¿Dónde estás ahora? _____
5. ¿Cómo es tu casa? _____
6. ¿Dónde está tu casa? _____

**Write 5 sentences about** Something **in the room. Make sure each sentence contains a form of SER or ESTAR.** (10 pts.)

_____
_____
_____
_____
_____

306

Music Around the World Unit

| Topic/Theme | Music from around the world.<br>Spain, India, Japan, Africa, France, Italy, Russia, Brazil |
|---|---|
| Cross- Curriculum Differentiation | ELA Connections: Identifying interesting information, identifying questions and important facts by highlighting.<br>History Connections: Identifying how historical events influenced instruments and music in different cultures around the world<br>SEL Connections: Students will learn how to respectfully express likes and dislikes of music from different cultures. |
| Essential Questions | What does music in different countries sound like?<br>How is it different or  similar to the  music in the United States?<br>What are the 4 main instrument families?<br>How are instruments used in different cultures?<br>What is the history of Music in different cultures? |
| Standards | **MU:Pr6.1.I a.** Demonstrate technical accuracy and expressive qualities, as well as an understanding of expressive intent, in prepared and improvised performances of a varied repertoire of music representing diverse cultures, styles, and genres.<br><br>**MU:Re7.1.6c.** Identify the context of music from a variety of genres, cultures, and historical periods<br><br>**MU:Pr4.1.6c**. When analyzing selected music, read and identify by name or function standard musical symbols (for example, rhythm, pitch, articulation, dynamics).<br><br>**MU:Re8.1.6a**. Describe a personal interpretation of how performers' application of the elements of music and expressive qualities, within genres and cultural and historical context, convey expressive intent.<br><br>**MU:Cn11.1.6a.** Demonstrate understanding of relationships between music and the other arts, other disciplines, varied contexts, and daily life as developmentally appropriate |
| Key Student Learning Objectives | **SWBAT** identify instruments from different cultures<br>**SWBAT** listen to and identify music from different countries<br>**SWBAT** research and understand the History of music in different cultures. |
| Sequence of learning activities | Introduction: Review instruments families (brass, percussion, strings, woodwind<br>Each week following will consist of 2 class periods<br><ul><li>Lesson 1: Introducing a country, completing a reading passage and a listening activity</li><li>Lesson 2: learning about and researching different instruments from that country</li><li>This will continue until all countries have been covered</li></ul> |

| | |
|---|---|
| | Conclusion: 1 test preparation day<br>Final day: Test |
| Resources to be used | "Music Around the World Unit" by StudentsSavvy<br>-worksheets<br>-reading passages<br>-videos<br>-Google Drive activities |
| Assessments | Students will complete a written assessment at the end of the unit testing their knowledge of instruments and history of Music from different countries. |

## Sample Student Reading Passage and Answer Key

# MUSIC OF SPAIN

Spanish music has influenced the Western and Latin American music of today. There are many music forms that come from Spain's different regions. When you hear bagpipes, you may think of Scotland, but in the northwest region of Spain, bagpipes are also very important in their music. From the 15th to the 17th centuries, Spain's music helped develop western classical music, especially using stringed instruments. Many classical guitar styles in the west are heavily reliant on music from Spain.

The music of Spain uses unique instruments, including *castanets*, *maracas*, and *bandurrias*. *Castanets* are sometimes called clackers or palillos (pronounced pa-liy-os). They are considered percussion instruments because they "clack" together when shaken. The musician holds one in each hand. Each of the castanets creates sounds of a slightly different pitch.

A special rattle called a *maraca* is another percussion instrument used Spanish music. Other names are rumba shaker and chac-chac. Each maraca has a ball on top of the handle, and they are usually played in pairs, one in each hand. In some places, they are also used in healing rituals.

The bandurria instrument is like a mixture between the mandolin and a guitar. The *bandurria* today has 12 strings, but in the 14th century, the *bandurria* had just three strings. Over time, other types appeared with four or even five strings.

It is easy to see how the music of Spain has crossed over into the music of the west. Some of today's music uses the incredible instruments from Spain.

## WHILE YOU'RE READING...

### MARK WITH SYMBOLS

| | |
|---|---|
| **!** | *when you find something interesting.* |
| **?** | *when you are unsure or confused by something.* |
| **✱** | *when you find something important.* |

### HIGHLIGHT / UNDERLINE WITH COLORS

| | |
|---|---|
| **yellow** | *power words or key terms* |
| **green** | *key phrases and definitions* |
| **blue** | *Answers to the questions (label with question #)* |

# SAMPLE ANNOTATION

# MUSIC OF SPAIN

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# Sample Activity

## Test Your Knowledge!

Can you guess the...
1. Instrument?
2. Where is was developed?
3. Instrument type?

**Directions:** After reading about the four different types of instruments (Percussion, String, Woodwind, and Brass) can you guess the name of the instrument and which category each instrument would fall into and why? See if you can guess where the instrument came from!

1

2

3

4

5

6

7

8

9

10

11

12

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Art Unit of Study

**Class: 5<sup>th</sup> Grade Visual Arts**
**Unit: Drawing**
**Number of Class Sessions: 4-5**

| Title | Green Roof Design |
|---|---|
| **Standards Addressed** | 5th VA:Cr2.1.5 a. Experiment and develop skills in multiple art-making techniques and approaches through practice.<br>5th VA:Cr2.2.5 a. Demonstrate quality craftsmanship through care for and use of materials, tools, and equipment.<br>5th VA:Cr2.3.5 a. Identify, describe, and visually document places or objects of personal significance.<br>5th VA:Cn11.1.5 a. Identify how art is used to inform or change beliefs, values, or behaviors of an individual or society |
| **Objectives** | Students will use 1 point perspective to sketch an aerial view of a city and will learn about green roof movements in urban environments. |
| **Concepts** | 1 Point Perspective<br>Cityscapes<br>Birdseye view<br>Benefits of green roofs<br>Urban Planning and Architecture |
| **Procedure** | Students will learn how to use perspective to create a birds eye view of a city and will design gardens on the roofs. Students will learn about urban green roof design and the positive way that this movement can greatly benefit the environment and economy. Students will expand upon their understanding of perspective and will practice in their sketchbooks connecting shapes to one vanishing point. After significant practice students will learn how to turn these shapes into city buildings as seen from above and will practice drawing windows, doors and streets that match up to the vanishing point. After creating a final drawing on a seperate piece of paper students will be shown several examples of urban green roofs and the environmental benefits of transforming unused space into gardening and recreational areas. After this introduction, students will be shown how landscape designers sketch out plans for projects and will begin to plan gardening and recreation spaces atop their buildings. |

| Assessment | Students will be assessed on their ability to draw one point perspective drawings that use straight lines and correctly meeting the vanishing point. |
|---|---|

**Examples of student work in progress (1) and completed (2 and 3):**



1.



2.



3.
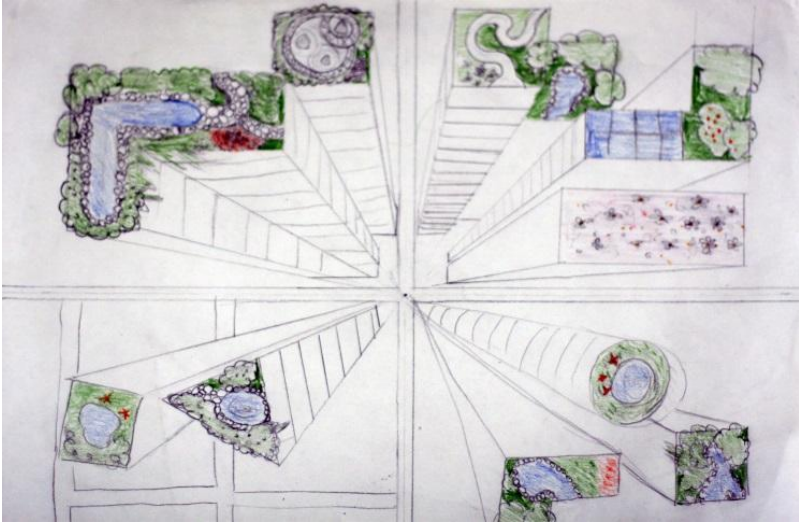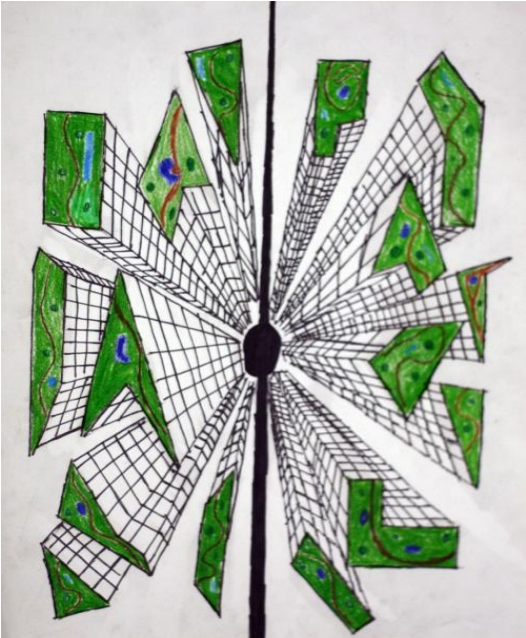
# **Bean Bag PE Unit**

**Teacher:** Mr. Flinn
**Grade Level:** K-3rd grade
**# of Students:** 24

**Facilities Available:** Half of the gymnasium (divided by curtain) or outside field.

**Equipment Needed:** 18 Hula Hoops, 24 poly spots, 9 cones, 24 bean bags and Plicker Magnets.

## **NASPE Goals Addressed:**
***Standard 1-***The physically literate individual demonstrates competency in a variety of motor skills and movement patterns.
***Standard 2-***The physically literate individual applies knowledge of concepts, principles, strategies and tactics related to movement and performance.
***Standard 3-***The physically literate individual demonstrates the knowledge and skills to achieve and maintain a health-enhancing level of physical activity and fitness.
***Standard 4-***The physically literate individual exhibits responsible personal and social behavior that respects self and others.
***Standard 5-***The physically literate individual recognizes the value of physical activity for health, enjoyment, challenge, self-expression and/or social interaction.

## **Illinois Content Standards Addressed:**
**Standard # 19.A.2** Demonstrate control when performing combinations and sequences in locomotor, non-locomotor and manipulative motor patterns.
**Standard # 19.B.2** Identify the principles of movement (e.g., absorption and application of force, equilibrium).
**Standard # 19.C.2a** Identify and apply rules and safety procedures in physical activities.
**Standard # 19.C.2b** Identify offensive, defensive and cooperative strategies in selected activities and games.
**Standard # 20.A.2a** Describe the benefits of maintaining a health-enhancing level of fitness.
**Standard #21.A.1a** Follow directions and class procedures while participating in physical activities.
**Standard #21.A.1c** Work independently on tasks for short periods of time.
**Standard # 21.A.2a** Accept responsibility for their own actions in group physical activities.
**Standard # 21.A.2b** Use identified procedures and safe practices without reminders during group physical activities.

**Unit Objectives:**
1. **Psychomotor:** SWBAT toss the bean bag while stepping with their opposite foot.
2. **Cognitive:** SWBAT adjust their strength while tossing a bean bag to toss into their target.
3. **Affective:** SWBAT demonstrate a positive attitude and participate in lessons 100% of the time.
4. **Fitness:** SWBAT participate in daily physical activity to maintain an elevated heart rate.

## Unit Block Plan

Block plan explanation: Students have PE 3 times a week. There is an A day (first day they have PE), B day (second day) and a C day (third day).

| Unit | A day | B day | C day |
|---|---|---|---|
| **Bean Bag** | Champions vs. Challengers | Make It, Take It | Bean Bag Golf |

# Student's Self Assessment

Plicker Magnets is a student self-assessment tool used daily in Mr. Flinn's PE class. The picture below shows a brief description of one of  how the Plicker Magnets are used in this unit. The students grade themselves by turning their Plicker Magnet (using their classroom number) so that the grade they are giving themselves is facing up. Then Mr. Flinn scans the students' self assessment using the Plickers app. This tells Mr. Flinn who still needs more help next time.  The Plicker Magnets are also used for multiple choice pre- and post-assessments.
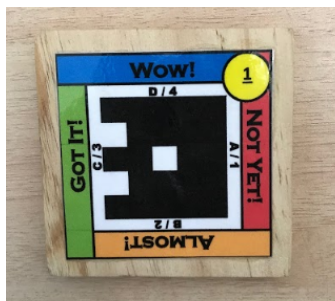
 - Plicker Magnet

# Example Lesson Plan

**Title**: Champion vs. Challengers- Bags

**Grade/s**: K-3

**Objective/s**: SWBAT demonstrate stepping with opposition while tossing.

**I can statement:** I Can step with my opposite foot while I toss

**Equipment**: 16 hula hoops, 16 bean bags, 8 large cones warm up cards Plicker Magnets

**Setup**: see diagram below

**Standard:**     **21.A.1a** Follow directions and class procedures while participating in physical activities.

**Warm-up**: teacher will pick a student who has their hand raised and a big smile and who has not been a warm up leader yet. The teacher will hold the warm up cards and like a deck of cards and have the student pick a card at random. Then the student will lead the entire class in the warm up that is on the card. Ten reps of each exercise. If the student needs help reading the card, the teacher will help.

**Game Play**:
Students will start by warming up by stretching and running four laps.  Hula hoops will be set up across from each other and color coded.  One side will be the champions, and the other side will be the challengers.  On the challenger's side, there will also be a poly spot with a bean bag on top.  There will be a student at each hula hoop (both champions and challengers).  Champions and challengers will both attempt to get the bean bag in the hula hoop first (Challenger always have first try).  The student that gets the bean bag in the other hoop first wins.  Winners are Champions and either move to that side or stay on that side.  If a student does not win, they must put the bean bag back on the poly spot, run around the gym and get back into the challenger line.  The teacher will assign new challengers as the hula hoops open up.  (If any part of the bean bag is on top of the hoop it is good.  If it is lying next and touching on the outside of hoop it is not good).

Champion side

Challenger side

4-5 students waiting in line
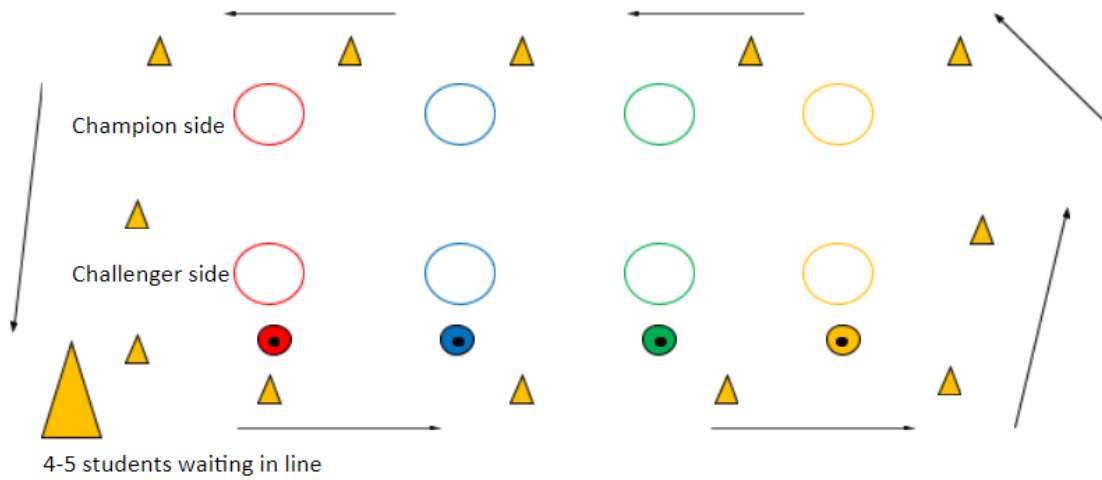
**Grading:**
When the students are done at the end of the activity, the students will put on their jackets and shoes. After they put on their shoes, the students will walk to the whiteboard and grade themselves according to the I CAN statement of the day. They will turn their plicker magnet to their grade with their grade facing up towards the sky. Then the teacher will scan it using the Plickers app.

# Dance Unit 2020-2021 - Physical Education

**Teacher:** Mr. Christopher Loustaunau
**Grade Level:** 4
**# of Students:** 24
**Facilities Available:** Half of the gymnasium (divided by curtain) or full gym.
**Equipment for Dance Unit:** Computer, projector, projector screen and stand, tripod, monitor, speaker, HDMI cord, speaker cord, power strip, extension cord, red tape on floor for personal dance area, dance songs on youtube, clipboard, checklist, pencil, dry erase board and markers

## Common Core State Standards (or National Content Standards)

### NASPE Goals Addressed:

*Standard 1.* The physically literate individual demonstrates competency in a variety of motor skills and movement patterns.
*Standard 2.* The physically literate individual applies knowledge of concepts, principles, strategies and tactics related to movement and performance.
*Standard 4.* The physically literate individual exhibits responsible personal and social behavior that respects self and others.
*Standard 5.* The physically literate individual recognizes the value of physical activity for health, enjoyment, challenge, self-expression and/or social interaction.

### National Outcomes:

| |
|---|
| Dribbles with hands or feet in combination with other skills (e.g., passing, receiving, shooting. (S1.E20.4) |
| Combines movement concepts with skills in small-sided practice tasks, gymnastics and dance environments. (S2.E2.4) |
| Exhibits responsible behavior in independent group situations. (S4.E1.4) |
| Listens respectfully to corrective feedback from others (e.g., peers, adults). (S4.E3.4) |
| Describes and compares the positive social interactions when engaged in partner, small-group and large-group physical activities. (S5.E4.4) |

**Illinois Content Standards Addressed:**

**STATE GOAL 19:** Acquire movement and motor skills and understand concepts necessary to engage in moderate to vigorous physical activity

**STATE GOAL 21:** Develop skills necessary to become a successful member of a team by working with others during physical activity.

**STATE GOAL 24:** Promote and enhance health and well-being through the use of effective communication and decision-making skills.

Illinois Standards:

| |
|---|
| **19.A.2a** Demonstrate control when performing combinations and sequences in locomotor, non-locomotor, and manipulative motor patterns. |
| **19.B.2b** Develop a basic understanding of multiple basic movement patterns with additional combination movement patterns. |
| **21.B.2a** Work cooperatively with a partner or small group to reach a shared goal during physical activity. |
| **24.A.2b** Demonstrate positive verbal and nonverbal communication skills (e.g., polite conversation, attentive listening, body language). |

**Unit Objectives:**
1. **Psychomotor:** SWBAT use their own balance, rhythm, and coordination to help better develop locomotor, non-locomotor, hand-eye coordination, eye tracking, and spatial awareness during dance class.
2. **Cognitive:** SWBAT apply new skills in a dance routine by practicing and repeating dance skills with music. SWBAT show correct dance form and transition to the next dance skill during the song.
3. **Affective:** SWBAT demonstrate a positive attitude, stay on task, and participate in lessons 100% of the time. SWBAT communicate, ask teacher for modifications if needed, and demonstrate leadership during each dance skill learned.

| Domains: | Assessment Tools: |
|---|---|
| **Psychomotor Domain:**<br>-perform dance skills from each google slide.<br>-correctly perform each dance skill and build muscle memory.<br>-practice dance skills with music and transition correctly with rhythm and coordination. | Informal teacher observation |
| **Cognitive Domain:**<br>-answer questions at the end on how to do dance skills and demonstrate for students.<br>-ask for student volunteers to demonstrate dance skills throughout class.<br>-students will be able to assess their own dance performance abilities as they observe and replicate classmates in class.<br>-students will take a summative dance quiz to show growth in their dance skills | Teacher's Questions, Closing Questions, Summative Dance Quiz |
| **Affective Domain:**<br>-listen attentively to instructions when being given.<br>-Show respect for other students that are learning how to dance. | Informal Self Reflection |

## Unit Block Plan

Block plan explanation: Students have PE 3 times a week. There is an A day (first day they have PE), B day (second day) and a C day (third day).

| Unit | A day | B day | C day |
|---|---|---|---|
| **Week 1** | Cha Cha Slide<br>Lesson 1 | Cupid Shuffle<br>Lesson 2 | Michael Jackson "Thriller"<br>Lesson 3 |

**<u>Teacher Observation Checklist (Example)</u>**

| Name | Activity Day A: Focus: | Activity Day B: Focus: | Activity Day C: Focus: |
|------|------|------|------|
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Key:

+ : Performed the activities main focus with great success and was respectful, responsible and safe.

/ : Performed the activities main focus with partial success and was respectful, responsible and safe.

- : Performed the activities main focus with limited success but was respectful, responsible and safe.

# Dance Lesson 1

| Unit | Dance Movements | ❏ RECORD ZOOM | IA's (circle) | IA's (circle) |
|---|---|---|---|---|
| Lesson | Cha Cha Slide Day 1 | ❏ IA Co-Host | 3-Mrs. Steinbeck | 3-Mrs. Trage |
| Mr. L | Classroom/Zoom | ❏ Camera View | 4-Mrs. Hansis | 4-Mr. Siegel |
| Grade | 4th Grade | ❏ Microphone | 5-Mrs. Zimmerman | 5-Ms. King |
| Date | 2020-2021 | Start Time: 2:00pm | 6-Mr. Stewart | 6-Mrs. Anderson |
| Time | 40 Minutes | End Time: 2:30pm | 7-Ms. Weber | 7-Mr. Scott |
| | | Morning Afternoon | 8-Mr. Blietz | 8-Ms. Anderson |

| | |
|---|---|
| Equipment | ● Mat, camera, laptop, tripod, monitor, microphone |
| I Can Statements ... | ● I can demonstrate Dance movements at home.<br><br>● I can explore different Dance movements to make virtual physical education more fun and exciting!<br><br>● I can follow Mr. Ouks Dance demonstration through Video instructions and Live instructions. |
| Links Videos | ● Dance Movements<br>● Cha Cha Dance Slides<br>● Cha Cha Slide Music |
| Intro 5 minutes | -Students Joins Zoom<br>-Teachers Joins Zoom<br>-Attendance<br><br>Assigned Instructional Assistance: Co-Host or Host<br><br>**Welcome Students**<br><br>Remind Expectations<br>● Mute Microphone unless Teacher lets you<br>● Turn on video<br>● Wear Comfortable Clothes Shoes<br>● Be in an open area or space<br>● Must be seen during exercises<br>● Chat room is used for questions only |

| | |
|---|---|
| | ● Be respectful at all times<br>● Participate at all times<br>● Safety<br>● No Eating during PE<br><br>Before the lesson begins Mr. Ouk will have students warm up with week 7 Summer Olympics Sports Movements |
| Transition | 1. Share Workout Video<br>2. Shift Camera View<br>3. Move on Mat start Fitness/Lesson |
| Fitness<br>10 Minutes | Warm Ups<br><br>Basketball<br>    ● Squat Dribbling Right hand (5 Time)<br>    ● Squat Dribbling Left Hand (5 Times)<br>    ● Squat Dribbling Crossover (5 Times)<br>    ● Squat Dribbling Chest Pass (10 Times)<br>    ● Squat Dribbling Bounce Pass (10 Times)<br>    ● Squat Dribbling Jump Shot (10 Times)<br><br>Baseball/Softball<br>    ● High Knees Fly ball Catch (10 Times)<br>    ● Side to Side Catch (10 Times)<br>    ● GroundBall Catch (10 Times)<br>    ● Pitch Throw Squat (10 Times)<br>    ● Swinging Batting/Hitting (10 Times)<br><br>Track/Field<br>    ● Jog in place (30 Seconds)<br>    ● Sprint in place (15 Seconds)<br>    ● Jog in place Jump forward (5 Times)<br>    ● Shot put throw (10 Times)<br><br>Swimming Strokes<br>    ● Freestyle Stroke (15 Seconds)<br>    ● Backstroke (15 Seconds)<br>    ● Butterfly Stroke (15 Seconds) |

| Lesson 10 Minutes | **Exercise 1: Cha Cha Slide**<br><br>**Demonstrate:** Teacher explains the historical and cultural context of the Cha Cha Slide. DJ Casper wrote this music. The Cha Cha Slide is a contemporary American Folk line dance inspired by the Chicago Steppin' Movement in the context of Swing dance.<br><br>**Benefit:** Aerobic workout which helps maintain a healthy heart and also provides a platform to get involved in a social environment, which is great for mental wellness<br><br>**Perform:**<br>Teacher performs movements with students without music (5 Minutes)<br>Teacher performs movements with students with music (5 Minutes) |
|---|---|

| Lyrics | Dance Moves |
|---|---|
| **Part 1**<br>1. **Its time to get funky**<br>2. **Clap your hands**<br>3. **To the left,**<br><br>4. **Take it back now ya'll**<br><br>5. **1 hop this time**<br>6. **Right foot lets stomp**<br>7. **Left foot lets stomp**<br>8. **Cha cha Jumping Jacks** | 1. **Move your head up and down**<br>2. **Open hands clap palms against each other**<br>3. **Step left foot to the left bring right foot together**<br>4. **Step back right foot back left foot together**<br>5. **Bend the leg push off from toes in take-off**<br>6. **Lift right knee point toes up bring right foot down**<br>7. **Lift Left knee point toes up bring left foot down**<br>8. **Stand upright legs together, arms at the side, bend knees slightly, jump into the air, spread leg out, stretch arms out, jump back to position** |
| **Part 2**<br>1. **Slide to the left**<br>2. **Slide to the right**<br>3. **Criss Cross** | 9. **Step with the left foot slide right foot into left foot**<br>10. **Step with right foot slide left foot into right foot**<br>11. **Jump legs apart, jump bring legs together right leg crosses the left leg, left leg crosses the right leg** |

| | Part 3<br>1. **Hands on your knees**<br>2. **Freeze**<br>3. **How low can you go?**<br>4. **Can you bring it to the top?**<br>5. **Reverse, Reverse**<br>6. **Charlie Brown** | 12. **Touch both hands on both knees moving up and down**<br>13. **Strike a Pose**<br>14. **Twist body coming down bending the knees**<br>15. **Raise body coming up**<br>16. **Turn body 360 degrees**<br>17. **One foot jump forward and one foot jump back** |
| --- | --- | --- |
| Transitions | 1. Move to camera view<br>2. Move Microphone | |
| Questions /<br>Answers | ● Q:What Dance movement did we do today? | |
| Close<br>5 Minutes | Thank every student leader and students that participated. | |

# Dance Lesson 2

| Unit | Dance Movements | ❏ RECORD ZOOM | IA's (circle) | IA's (circle) |
|---|---|---|---|---|
| **Lesson** | **Cupid Shuffle Day 2** | ❏ IA Co-Host | **3-Mrs. Steinbeck** | **3-Mrs. Trage** |
| **Mr. L** | **Classroom/Zoom** | ❏ Camera View | **4-Mrs. Hansis** | **4-Mr. Siegel** |
| **Grade** | **4th Grade** | ❏ Microphone | **5-Mrs. Zimmerman** | **5-Ms. King** |
| **Date** | **2020-2021** | **Start Time: 8:30am** | **6-Mr. Stewart** | **6-Mrs. Anderson** |
| **Time** | **40 Minutes** | **End Time: 9:00am** | **7-Ms. Weber** | **7-Mr. Scott** |
| | | **Morning    Afternoon** | **8-Mr. Blietz** | **8-Ms. Anderson** |

| | |
|---|---|
| Equipment | ● Mat, camera, laptop, tripod, monitor, microphone |
| I Can Statements... | ● I can demonstrate Dance movements at home.<br><br>● I can explore different Dance movements to make virtual physical education more fun and exciting!<br><br>● I can follow Mr. Ouks Dance demonstration through Video instructions and Live instructions. |
| Links Videos | ● <u>Dance Movements</u><br>● <u>Cha Cha Dance Slides</u><br>● <u>Cha Cha Slide Music</u><br>● <u>Cupid Shuffle Music</u> |
| Intro 5 minutes | -Students Joins Zoom<br>-Teachers Joins Zoom<br>-Attendance<br><br>Assigned Instructional Assistance: Co-Host or Host<br><br>**Welcome Students**<br><br>Remind Expectations<br>● Mute Microphone unless Teacher lets you<br>● Turn on video<br>● Wear Comfortable Clothes Shoes<br>● Be in an open area or space<br>● Must be seen during exercises<br>● Chat room is used for questions only |

| | |
|---|---|
| | ● Be respectful at all times<br>● Participate at all times<br>● Safety<br>● No Eating during PE<br><br>Before the lesson begins Mr. Ouk will ask students what was the name of the dance we did on Day 1<br><br>1. Cha Cha Slide |
| Transition | 1. Share Workout Video<br>2. Shift Camera View<br>3. Move on Mat start Fitness/Lesson |
| Fitness<br>10 Minutes | Warm Ups<br>● Tilt Neck left and right (10 times)<br>● Tilt Neck up and down (10 times)<br>● Circle Neck clockwise (3 Times)<br>● Circle Neck Counterclockwise (3 Times)<br>● Shoulder Shrug (10 Times)<br>● Shoulder roll Forward (3 Time)<br>● Shoulder roll backward (3 Time)<br>● Small Arm circles forward and backward  (10 seconds)<br>● Big Arm Circles Forward and backward (5 seconds)<br>● Bend Touch right foot (5 Seconds)<br>● Bend Touch left foot (5 seconds)<br>● Bend Touch between legs (5 seconds)<br>● Standing Quad stretch (8 seconds)<br>● Standing Knee to chest Stretch (8 Seconds)<br>● High Knees (10 Times)<br>● Right Fist Pump Hop (10 seconds)<br>● Left Fist Pump Hop (10 Seconds)<br>● Alternate Fist Pump Hop (10 Seconds)<br>● Right Shoulder Stretch (10 Seconds)<br>● Left Shoulder Stretch (10 Seconds) |
| Lesson<br>10 Minutes | **Exercise 1: Cha Cha Slide**<br><br>**Demonstrate:** Teacher explains the historical and cultural context of the Cha Cha Slide. DJ Casper wrote this music. The Cha Cha Slide is a contemporary American Folk line dance inspired by the Chicago Steppin' Movement in the context of Swing dance.<br><br>**Benefit:** Aerobic workout which helps maintain a healthy heart and also provides a platform to get involved in a social environment, which is great for mental wellness<br><br>**Perform:**<br>Teacher performs movements with students without music (5 Minutes) |

Teacher performs movements with students with music (5 Minutes)

| Lyrics | Dance Moves |
|---|---|
| **Part 1**<br>1. **Its time to get funky**<br>2. **Clap your hands**<br>3. **To the left,**<br><br>4. **Take it back now ya'll**<br><br>5. **1 hop this time**<br>6. **Right foot lets stomp**<br>7. **Left foot lets stomp**<br>8. **Cha cha Jumping Jacks** | 1. **Move your head up and down**<br>2. **Open hands clap palms against each other**<br>3. **Step left foot to the left bring right foot together**<br>4. **Step back right foot back left foot together**<br>5. **Bend the leg push off from toes in take-off**<br>6. **Lift right knee point toes up bring right foot down**<br>7. **Lift Left knee point toes up bring left foot down**<br>8. **Stand upright legs together, arms at the side, bend knees slightly, jump into the air, spread leg out, stretch arms out, jump back to position** |
| **Part 2**<br>1. **Slide to the left**<br>2. **Slide to the right**<br>3. **Criss Cross** | 9. **Step with the left foot slide right foot into left foot**<br>10. **Step with right foot slide left foot into right foot**<br>11. **Jump legs apart, jump bring legs together right leg crosses the left leg, left leg crosses the right leg** |
| **Part 3**<br>1. **Hands on your knees**<br>2. **Freeze**<br>3. **How low can you go?**<br>4. **Can you bring it to the top?**<br>5. **Reverse, Reverse**<br>6. **Charlie Brown** | 12. **Touch both hands on both knees moving up and down**<br>13. **Strike a Pose**<br>14. **Twist body coming down bending the knees**<br>15. **Raise body coming up**<br>16. **Turn body 360 degrees**<br>17. **One foot jump forward and one foot jump back** |

**Exercise 2: Cupid Shuffle**

| | |
|---|---|
| | **Demonstration:**<br>**Part 1.**<br>1. Ready Position – Feet together facing forward "Ready"<br>2. Step with right foot, slide left foot to the right foot x4 "Step right<br>3. Step with left foot, slide right foot to the left foot x4 "Step left**"**<br><br>**Part 2.**<br>Right foot kick "Right kick"<br>5. Left foot kick "Left kick"<br>6. Repeat kick for each foot x2 "Repeat kick"<br><br>**Part 3.**<br> 7. Walk in place to the left 4 counts "Walk" 8. Repeat steps 1-7 until facing north again "Repeat"<br><br>**Benefits:** Build self-confidence with each new routine practice and master<br><br>**Perform:**<br>Teacher performs movements with students without music<br>Teacher performs movements with students with music |
| Transitions | 1. Move to camera view<br>2. Move Microphone |
| Questions /<br>Answers | ● Q:What Dance movement did we do today? |
| Close<br>5 Minutes | Thank every student leader and students that participated. |

# Dance Lesson 3

| Unit | Dance Movements | ❏ RECORD ZOOM | IA's (circle) | IA's (circle) |
|------|-----------------|---------------|---------------|---------------|
| **Lesson** | **Thriller Day 3** | ❏ IA Co-Host | **3-Mrs. Steinbeck** | **3-Mrs. Trage** |
| **Mr. L** | **Classroom/Zoom** | ❏ Camera View | **4-Mrs. Hansis** | **4-Mr. Siegel** |
| **Grade** | **4th Grade** | ❏ Microphone | **5-Mrs. Zimmerman** | **5-Ms. King** |
| **Date** | **2020-2021** | **Start Time: 2:00pm** | **6-Mr. Stewart** | **6-Mrs. Anderson** |
| **Time** | **40 Minutes** | **End Time: 2:30pm** | **7-Ms. Weber** | **7-Mr. Scott** |
| | | **Morning       Afternoon** | **8-Mr. Blietz** | **8-Ms. Anderson** |

| | |
|---|---|
| Equipment | ● Mat, camera, laptop, tripod, monitor, microphone |
| I Can Statements... | ● I can demonstrate Dance movements at home.<br><br>● I can explore different Dance movements to make virtual physical education more fun and exciting!<br><br>● I can follow Mr. Ouks Dance demonstration through Video instructions and Live instructions. |
| Links Videos | ● <u>Dance Movements</u><br>● <u>Cha Cha Dance Slides</u><br>● <u>Cha Cha Slide Music</u><br>● <u>Cupid Shuffle Music</u><br>● <u>Michael Jackson "Thriller" Music</u> |
| Intro 5 minutes | -Students Joins Zoom<br>-Teachers Joins Zoom<br>-Attendance<br><br>Assigned Instructional Assistance: Co-Host or Host<br><br>**Welcome Students**<br><br>Remind Expectations<br>● Mute Microphone unless Teacher lets you<br>● Turn on video<br>● Wear Comfortable Clothes Shoes<br>● Be in an open area or space<br>● Must be seen during exercises<br>● Chat room is used for questions only<br>● Be respectful at all times<br>● Participate at all times<br>● Safety |

| | |
|---|---|
| | ● No Eating during PE<br>Before the lesson begins Mr. Ouk will ask students what was the name of the dance we did on Day 2<br><br>1. Cupid Shuffle |
| Transition | 1. Share Workout Video<br>2. Shift Camera View<br>3. Move on Mat start Fitness/Lesson |
| Fitness<br>5 Minutes | Warm Ups<br>● Tilt Neck left and right (10 times)<br>● Tilt Neck up and down (10 times)<br>● Circle Neck clockwise (3 Times)<br>● Circle Neck Counterclockwise (3 Times)<br>● Shoulder Shrug (10 Times)<br>● Shoulder roll Forward (3 Time)<br>● Shoulder roll backward (3 Time)<br>● Small Arm circles forward and backward  (10 seconds)<br>● Big Arm Circles Forward and backward (5 seconds)<br>● Bend Touch right foot (5 Seconds)<br>● Bend Touch left foot (5 seconds)<br>● Bend Touch between legs (5 seconds)<br>● Standing Quad stretch (8 seconds)<br>● Standing Knee to chest Stretch (8 Seconds)<br>● High Knees (10 Times)<br>● Right Fist Pump Hop (10 seconds)<br>● Left Fist Pump Hop (10 Seconds)<br>● Alternate Fist Pump Hop (10 Seconds)<br>● Right Shoulder Stretch (10 Seconds)<br>● Left Shoulder Stretch (10 Seconds) |
| Lesson<br>15 Minutes | **Exercise 1: Cha Cha Slide**<br><br>**Demonstrate:** Teacher explains the historical and cultural context of the Cha Cha Slide. DJ Casper wrote this music. The Cha Cha Slide is a contemporary American Folk line dance inspired by the Chicago Steppin' Movement in the context of Swing dance.<br><br>**Benefit:** Aerobic workout which helps maintain a healthy heart and also provides a platform to get involved in a social environment, which is great for mental wellness<br><br>**Perform:**<br>Teacher performs movements with students without music (5 Minutes)<br>Teacher performs movements with students with music (5 Minutes) |

| Lyrics | Dance Moves |
|---|---|
| **Part 1** <br> 1. **Its time to get funky** <br> 2. **Clap your hands** <br> 3. **To the left,** <br><br> 4. **Take it back now ya'll** <br><br> 5. **1 hop this time** <br> 6. **Right foot lets stomp** <br> 7. **Left foot lets stomp** <br> 8. **Cha cha Jumping Jacks** | 1. **Move your head up and down** <br> 2. **Open hands clap palms against each other** <br> 3. **Step left foot to the left bring right foot together** <br> 4. **Step back right foot back left foot together** <br> 5. **Bend the leg push off from toes in take-off** <br> 6. **Lift right knee point toes up bring right foot down** <br> 7. **Lift Left knee point toes up bring left foot down** <br> 8. **Stand upright legs together, arms at the side, bend knees slightly, jump into the air, spread leg out, stretch arms out, jump back to position** |
| **Part 2** <br> 1. **Slide to the left** <br> 2. **Slide to the right** <br> 3. **Criss Cross** | 9. **Step with the left foot slide right foot into left foot** <br> 10. **Step with right foot slide left foot into right foot** <br> 11. **Jump legs apart, jump bring legs together right leg crosses the left leg, left leg crosses the right leg** |
| **Part 3** <br> 1. **Hands on your knees** <br> 2. **Freeze** <br> 3. **How low can you go?** <br> 4. **Can you bring it to the top?** <br> 5. **Reverse, Reverse** <br> 6. **Charlie Brown** | 12. **Touch both hands on both knees moving up and down** <br> 13. **Strike a Pose** <br> 14. **Twist body coming down bending the knees** <br> 15. **Raise body coming up** <br> 16. **Turn body 360 degrees** <br> 17. **One foot jump forward and one foot jump back** |

**Exercise 2: Cupid Shuffle**

**Demonstration:**
**Part 1.**
1. Ready Position – Feet together facing forward "Ready"
2. Step with right foot, slide left foot to the right foot x4 "Step right
3. Step with left foot, slide right foot to the left foot x4 "Step left**"**

**Part 2.**
Right foot kick "Right kick"
5. Left foot kick "Left kick"
6. Repeat kick for each foot x2 "Repeat kick"

**Part 3.**
 7. Walk in place to the left 4 counts "Walk" 8. Repeat steps 1-7 until facing north again "Repeat"

**Benefits:** Build self-confidence with each new routine practice and master

**Perform:**
Teacher performs movements with students without music
Teacher performs movements with students with music

**Exercise 3: Michael Jackson "Thriller"**

**Demonstrate:**
**Part 1.**
1. Ready Position – Start kneeling on the ground
2. Raise body coming up
3. Feet together facing forward "Ready"
4. Step with right foot, slide left foot to the right foot x4 "Step right Claws out to the side
5. Step with left foot, slide right foot to the left foot x4 "Step left**"** Claws out to the side

**Part 2.**
6. Right Knee up Claws
5. Left Knee up Claws
6. Repeat Knee Ups for each foot x2 "Repeat Knee Ups"

**Part 3.**
 7. Walk forward arms out in front pretend being zombies 4 steps forward 4 steps back
 8.  Right Knee up Claws
 9. Left Knee up Claws
10.  Repeat Knee Ups for each foot x2 "Repeat Knee Ups"
11. Step with right foot, slide left foot to the right foot x4 "Step right Claws out to the side

| | |
|---|---|
| | 12. Step with left foot, slide right foot to the left foot x4 "Step left**"** Claws out to the side<br><br><br>**Benefits:** Increases mental capacity by exercising our cognitive process<br><br>**Perform:**<br>Teacher performs movements with students without music<br>Teacher performs movements with students with music |
| Transitions | 1. Move to camera view<br>2. Move Microphone |
| Questions /<br>Answers | ● Q:What Dance movement did we do today? |
| Close<br>5 Minutes | Thank every student leader and students that participated. |

DANCE Quiz

Name:_____

Teacher:_____

Directions: Fill in the blank or circle the correct answer in the parenthesis.

1. Circle the three dance themes you learned in the dance unit?
    A.  Cha Cha Slide
    B.  Cupid Shuffle
    C.  Michael Jackson "Thriller"
    D.  Just Dance Video

2. Circle the three dance skills you learned in the Cha Cha Slide dance lesson?
    A.  Clap Hands
    B.  Move to the Left
    C.  Right Foot Stomp
    D.  Cha Cha Pushups

3. Put the Cupid Shuffle Sequence in order using 1, 2, 3, 4?

    _____ Jogging Place 4x

    _____ Stepping to the Right 4x

    _____ Right Foot kick, Left Foot Kick

    _____ Stepping to the Left 4x

4. Thriller dance song is one of the most played songs on this holiday?
    A.  Your Birthday
    B.  July 4th "Independence Day"
    C.  Halloween
    D.  Thanksgiving

5. The Cha Cha Slide dance song is what type of music?
    A.  Pop
    B.  Hip Hop
    C.  Country
    D.  Contemporary American Folk line dance

Section F: Updated Goals,Objectives, and Pupil Performance Standards

Section F: Updated Goals, Objectives, and Pupil Performance Standards 2020-2021

**Education & Curriculum**

The 2020-2021 Prairie Crossing Charter School (PCCS) school year started with Remote Learning for all students and staff.  Unfortunately, the continuation of remote learning created several challenges  for our staff, students, and community.  As we navigated several phases of education models throughout the year, PCCS' start of year inservice hours were focussed on the training and planning for remote and concurrent hybrid learning.  Prairie Crossing continues to use available data to help innovate, improve, and drive future instruction. Our staff spent several inservice hours creating and evaluating assessment tools and data which could help us understand the impact we were making on student, class, grade, and school learning.

As teams, the staff continued training  and modifying curriculum in order to deliver in both virtual and hybrid classrooms, the administration worked on  assessing and modifying learning plans to ensure smooth transitions through the pandemic learning year.

Kindergarten through 2nd grade continued to pilot new ELA materials. These materials, which are more closely aligned with current assessment and benchmarking tools and practices, are expected to help teachers broaden their approach in early literacy. Assessment of the Pilot will be postponed one year as a result of inconsistent assessment results.

In the 3rd through 8th grades, teachers were working on the project of integrating writing strategies which provide continuity throughout the upper grades. This work will continue into the 2021-2022 school year.  During the 2021/2022 school year we will finalize these plans with the creation of common writing assessments and subsequently begin the work of ensuring curriculum and instruction is designed and accurate to meet the writing goals for the school.

The staff is now in its fourth year using the new Bridges Math materials.  Currently , we do not feel we have  accurate assessment data to make long lasting implementation decisions with this math program.  This year, the PCCS Mathematic team was able to completely integrate another grade into the enrichment opportunities for all students. In addition to providing enrichment classes in 4th through 8th grades in math and ELA, PCCS is now prepared to expand the accelerated and advanced math program to the 5th grade students. Of the 47 students graduating in 2021, 47% completed Algebra or above, and 18% completed Geometry.

Overall, PCCS students exceeded expectations for the school year. Although our assessment data does indicate a slightly wider range of raw scores in our standardized (NWEA) data, the fall to spring growth scores are greater than predicted and nearly on track for a typical  non-covid year. Using a combination of existing curriculum, modified for virtual delivery, and strategies (High SEL instruction and intervention, Small groups in Guided Reading and Math, GAFE, SeeSaw) the teachers were able to modify and teach our students and parents the digital platforms, tools, and strategies needed to deliver the majority of the remaining curriculum with engagement and fidelity. With strong procedures, plans, and attendance,the staff maintained high levels of engagement with most students,  especially in the elementary grades. PCCS students

experienced a smaller academic slide than anticipated given the unique conditions for learning.

The PCCS' Student Services intervention team continued its success by providing intervention for more than 35% of the school's total population. The intervention staff built upon a structured MTSS plan along with developing strategies for responding to these changes in our student population with increased intervention identification and delivery for grades K-8.  The team was able to provide dedicated ELA Tier 2 & 3 interventions in all grade bands and added  a deeper home-school partnership by providing  "Parents as Teacher" support to any family needing assistance.

**Social Emotional: Positive Behavior Intervention and Supports (PBIS)**

PCCS continues to build upon the previous successes of the PBIS team.  This year, our PBIS team  delivered the highest level of support, earning a fifth consecutive Platinum Award with the Midwest PBIS Network.  The PCCS School Psychologist, who leads this effort  is nominated this year for the Illinois "Those Who Excel"  award.

**Staffing and Professional Development**

Prairie Crossing Charter School had 94% retention of  certified teachers.  This high level of continuity with certified staff allows us to focus on building on past training and learning.  Thus, the faculty continued with our unique four legged approach to Professional Development (PD). The first level of PD has all 1st and 2nd year teachers working closely with their mentors to build basic skills and assimilate into the PCCS culture and practice.  This included weekly meetings, attending individualized PD together, and mentor observations. Career teachers developed personal and student growth goals.

From these goals, these teachers identified, with school leadership, specific individual PD goals to best meet their individual needs. These ranged from:

- Attending National Conferences, local instructional seminars, formal courses of instruction, to grade level and content area articulation with surrounding schools and organizations.
    - Nation Green Schools Conference  (virtual)
    - IAR Readiness Training & Mentoring
    - Creating Remote Learning plans
    - ISBE Webinar creation and delivery - "Outside the Four Walls - Engaging Students Through Environmental Education"

**Academic Best Practices:** Prairie Crossing continued working on the goals of creating partnerships and developing best practices in Curriculum & Instruction in Education for Sustainability (EfS).

Over the past four years, PCCS has focused on creating a comprehensive Natural Leaders program that reflects the best practices of creating a climate and culture that support student health and achievement. By blending research-based practices

related to social and emotional learning with best practices related to creating a climate that supports sustainability mindsets, PCCS is now implementing as assessment model that will allow us to monitor both short term and long-term impacts of our program and on the development of sustainability mindsets that allow students, faculty, and staff to care for self, others, and the environment.

The work PCCS has done to refine our model so that all students demonstrate growth each year in all academic standards through an integrated curriculum grounded in education for sustainability, service learning, and place-project-problem based learning (P³BL) sets us apart from many of the schools and districts in the nation.

We have created a comprehensive rubric that allows faculty to examine and improve their curriculum based on research-based practices and we've transformed our curriculum maps so that every child, every year, experiences deeper learning through an integrated P³BL  curriculum unit. While this work in on-going the work that PCCS has done to support faculty and staff in understanding sustainability is a game changer that will have long lasting effects.

As a member of the Catalyst Network, Prairie Crossing has become a replication hub that allows others to come to our site to learn how to implement best practices related to becoming a healthy, equitable and sustainable school.

PCCS has been highlighted in numerous articles in the Network's *GreenNotes* newsletter and *Green Schools Catalyst Quarterly*, the only peer review publication for green, healthy, and sustainable schools in the world, and we will be featured in an upcoming book to be published later this year, titled *Trailblazers for Whole School Sustainability: Case Studies of Educators in Action.*

In addition, PCCS staff was also invited to work with *Measurement Incorporated Evaluation Services*, sponsored by ISBE, to create and deliver a webinar entitled "Outside the Four Walls" that featured sharing PCCS best practices in EfS with other schools in Illinois.

# Section G: Evaluation of Student Performance

# Section G: Evaluation of Students' Performance

## Types of Assessment, Timelines, 2020-2021

During the 2020-2021 year, universal screenings were notably impacted by the COVID-19 pandemic. Students in grades 3-8 completed NWEA MAP assessments in fall, and grades 2-8 completed in spring. Students in grades K-2 completed aimswebPLUS assessments in spring. The BESS social-emotional self-report screening was completed in grades 4-8 fall and late winter, and teachers in grades K-4 completed a uniquely-crafted (i.e., with items relevant to remote and hybrid learning environments) social-emotional questionnaire in fall and late winter. The assessments given are listed below:

| Grade Level/ Assessment | K | 1st | 2nd | 3rd | 4th | 5th | 6th | 7th | 8th |
|---|---|---|---|---|---|---|---|---|---|
| *District Assessments* | | | | | | | | | |
| aimswebPLUS Assessments of Early Literacy/ Reading | Spring | Spring | Spring | Not Completed | | | | | |
| aimswebPLUS Assessments of Early Numeracy/ Math | Spring | Spring | Spring | Not Completed | | | | | |
| NWEA/MAPS (Reading & Math) | N/A | | Spring | Fall & Spring | Fall & Spring | Fall & Spring | Fall & Spring | Fall & Spring | Fall & Spring |
| Fountas & Pinnell (Reading) | Not Completed | | | | | | | | |
| SEL Teacher Questionnaire (Behavior) | Fall & Late Winter | | | | | -- | -- | -- | -- |
| BESS Self Report (Behavior) | N/A | | | | Fall & Late Winter | | | | |
| *State Assessments* | | | | | | | | | |
| ACCESS (EL*) | X | X | X | X | X | X | X | X | X |
| IAR | N/A | | | Spring | | | | | |

*EL students take all other assessments as per their grade level requirements*

## Data Review/Tiers of Support

PCCS utilizes a Multi-Tiered System of Supports (MTSS) for students. During a typical school year, upon completion of the universal screenings each trimester, the assessment data is examined by the Data Team, which includes the Director of Student Services, Dean of Staff and Students, School Psychologist/Intervention Coordinator, Grade Level Resource Teacher and Grade Band Classroom Teachers. Data is examined to determine each student's attainment and/or progress toward grade level academic benchmarks and needs for intervention support. When students perform below set benchmarks (below the grade level benchmark [25th-30th percentile] on aimswebPLUS Curriculum-Based Measurements, below expectations on Fountas & Pinnell benchmark assessment, or below the 35th percentile on the NWEA in the content area of reading and/or math), the Data Teams discuss additional factors that may be impacting a student's performance. Data teams and teachers discuss student performance on classroom assessments, unit assessments, assignments, and day-to-day performance. Data review was understandably impacted during the COVID-19 pandemic, but teams remained in close contact with related service staff to discuss data and resulting student needs.

A student is typically identified as needing intervention when performance on two or more indicators is below grade level expectations. Students are determined eligible for Tier 2 and Tier 3 interventions based on data collected from formal benchmark assessments and informal assessments/information from the classroom teacher. Students determined eligible receive instruction in the core curriculum along with additional instruction either in the classroom by the classroom teacher and/or instructional assistant and/or by an interventionist outside of the regular classroom. Students receiving assistance are instructed in small groups within the classroom, or individually/in a small group outside of the classroom. Parents of students identified as needing intervention(s) are contacted by the Intervention Coordinator via formal letter describing the need and types of support the student will receive. At Tiers 2 and 3, students have goals set and progress is monitored on an ongoing basis, typically every other week. A schedule is set which reflects when students will be pulled for intervention outside of the classroom and for how often.

Each student's progress data is typically discussed at least monthly during intervention team meetings and via communication with the teacher. If a student is not making progress, intervention is adjusted; this may include changing the frequency or duration of intervention, group configuration, and materials being used. If needed, the student may be referred to the Student Support Team (SST) to begin the problem solving process. Reports of student progress are sent home each trimester in line with report cards.

In addition to collecting and reviewing academic data for intervention, PCCS collects and reviews behavioral data for intervention. Upon completion of behavioral screening twice per year (fall and late winter) using a research-based screening tool, data is reviewed by the School Social Worker and School Psychologist/Intervention Coordinator, and the Administrative Team. In light of the COVID-19 pandemic, the team created a teacher questionnaire for grades K-4 that included items relevant to the remote/hybrid learning environments along with items from the BESS tool that is traditionally used. Additional sources of data considered include office discipline referrals, Student Support Team (SST) referrals, and teacher observations. Difficulties identified in the student's educational functioning due to behavioral, organizational, and/or emotional factors are examined to determine if the student is at or below grade level behavioral standards, and what tier of behavioral/social-emotional support is appropriate:

- **Tier 1**: General behavior expectations per the PBIS Matrix, core social-emotional curriculum with weekly to bimonthly visits from School Social Worker and/or School Psychologist (provided over Zoom and in-person based on phase), Social-emotional website shared with staff and families, Restorative practices related to classroom supports and discipline

- **Tier 2**: *Tier 1 plus* Check In/Check Out (CICO; Remotely completed electronically), Social Academic Instructional Groups (SAIGs), SST referral and problem-solving process, and individual social work

- **Tier 3**: *Tiers 1 and 2 plus* Modified CICO (individual goals and/or structure), FBA/BIP, and Referral for special education evaluation

## Assessment Data 2020-2021

*Due to the COVID-19 crisis, assessment data is incomplete for some measures which were not obtained remotely. For some measures, a degree of caution is warranted when interpreting data which were potentially impacted by technology issues and/or by the remote setting in which they were completed.*

### Assessment Results by Grade Level & Benchmark Period 2020-2021

## aimswebPLUS Early Literacy/Reading

Kindergarten Letter Word Sound Fluency- Spring:

| Comparison: National | 2020-2021 |
|---|---|
| 90-99th %ile | 0 (0.0%) |
| 75-89th %ile | 2 (5.1%) |
| 26-74th %ile | 9 (23.1%) |
| 11-25th %ile | 13 (33.3%) |
| 1-10th %ile | 15 (38.5%) |
| Total Students | 39 |
| Mean | 30.1 |
| Standard Deviation | 12.32 |

## Kindergarten Phoneme Segmentation- Spring:

| Comparison: National | 2020-2021 |
| --- | --- |
| 90-99th %ile | 10 (29.4%) |
| 75-89th %ile | 10 (29.4%) |
| 26-74th %ile | 5 (14.7%) |
| 11-25th %ile | 6 (17.6%) |
| 1-10th %ile | 3 (8.8%) |
| Total Students | 34 |
| Mean | 40.6 |
| Standard Deviation | 12.65 |

## Grade 1 Nonsense Word Fluency- Spring:

| Comparison: National | 2020-2021 |
| --- | --- |
| 90-99th %ile | 2 (4.1%) |
| 75-89th %ile | 6 (12.2%) |
| 26-74th %ile | 11 (22.4%) |
| 11-25th %ile | 15 (30.6%) |
| 1-10th %ile | 15 (30.6%) |
| Total Students | 49 |
| Mean | 57.1 |
| Standard Deviation | 32.53 |

## Grade 1 Oral Reading Fluency- Spring:

| Comparison: National | 2020-2021 |
| --- | --- |
| 90-99th %ile | 7 (14.3%) |
| 75-89th %ile | 8 (16.3%) |
| 26-74th %ile | 19 (38.8%) |
| 11-25th %ile | 8 (16.3%) |
| 1-10th %ile | 7 (14.3%) |
| Total Students | 49 |
| Mean | 74.7 |
| Standard Deviation | 36.87 |

Grade 2 Reading Benchmark- Spring:

| Comparison: National | 2020-2021 |
|---|---|
| 90-99th %ile | 8 (17.0%) |
| 75-89th %ile | 11 (23.4%) |
| 26-74th %ile | 18 (38.3%) |
| 11-25th %ile | 4 (8.5%) |
| 1-10th %ile | 6 (12.8%) |
| Total Students | 47 |
| Mean | 401.1 |
| Standard Deviation | 66.93 |

## NWEA MAP Reading/Language Arts

Language Arts: Reading

| | | Comparison Periods | | | | | | | | Growth Evaluated Against | | | | | |
| | | Fall 2020 | | | Spring 2021 | | | Growth | | Grade-Level Norms | | | Student Norms | | | |
| Grade (Spring 2021) | Growth Count‡ | Mean RIT | SD | Percentile | Mean RIT | SD | Percentile | Observed Growth | Observed Growth SE | Projected Growth | School Conditional Growth Index | School Conditional Growth Percentile | Count with Projection | Count Met Projection | Percent Met Projection | Student Median Conditional Growth Percentile |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 2 | 0 | ** | | | ** | | | ** | | | | | ** | | | |
| 3 | 44 | 201.6 | 12.0 | 98 | 204.6 | 12.2 | 85 | 3 | 1.9 | 9.8 | -3.23 | 1 | 44 | 16 | 36 | 29 |
| 4 | 47 | 207.0 | 13.9 | 92 | 210.8 | 13.2 | 80 | 4 | 1.3 | 7.6 | -1.82 | 3 | 47 | 19 | 40 | 34 |
| 5 | 46 | 216.4 | 13.4 | 95 | 221.2 | 14.9 | 93 | 5 | 1.2 | 5.9 | -0.54 | 29 | 46 | 24 | 52 | 52 |
| 6 | 46 | 219.9 | 13.3 | 91 | 222.3 | 13.1 | 84 | 2 | 0.8 | 4.6 | -1.28 | 10 | 46 | 19 | 41 | 38 |
| 7 | 43 | 223.7 | 15.6 | 90 | 227.5 | 10.4 | 90 | 4 | 1.2 | 3.7 | 0.03 | 51 | 43 | 25 | 58 | 51 |
| 8 | 44 | 228.6 | 16.5 | 91 | 232.7 | 13.8 | 92 | 4 | 1.3 | 3.1 | 0.49 | 69 | 44 | 21 | 48 | 50 |



Language Arts: Reading

345
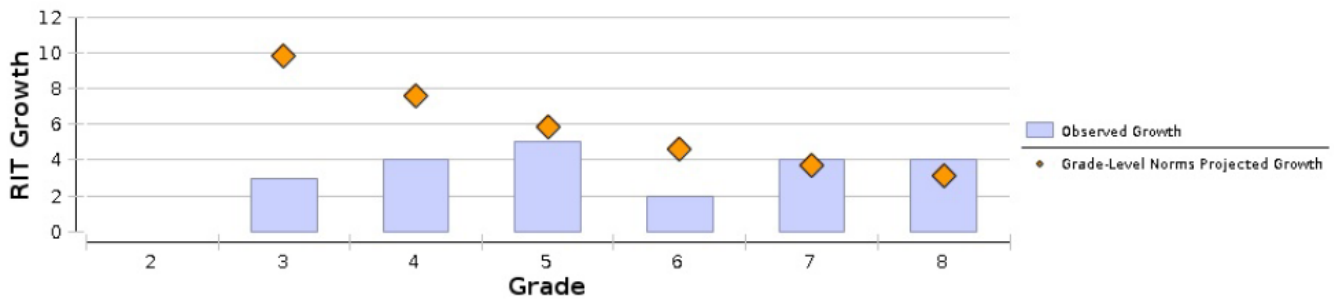
**aimswebPLUS Early Numeracy/Math**

Kindergarten Quantity Total Fluency- Spring:

| Comparison: National | 2020-2021 |
|---|---|
| 90-99th %ile | 2 (5.1%) |
| 75-89th %ile | 2 (5.1%) |
| 26-74th %ile | 16 (41.0%) |
| 11-25th %ile | 8 (20.5%) |
| 1-10th %ile | 11 (28.2%) |
| Total Students | 39 |
| Mean | 16.0 |
| Standard Deviation | 4.26 |

Grade 1 Math Facts Fluency 1 Digit- Spring:

| Comparison: National | 2020-2021 |
|---|---|
| 90-99th %ile | 7 (14.3%) |
| 75-89th %ile | 8 (16.3%) |
| 26-74th %ile | 23 (46.9%) |
| 11-25th %ile | 3 (6.1%) |
| 1-10th %ile | 8 (16.3%) |
| Total Students | 49 |
| Mean | 16.5 |
| Standard Deviation | 6.30 |

Grade 1 Number Comparison Fluency-Pairs- Spring:

| Comparison: National | 2020-2021 |
|---|---|
| 90-99th %ile | 5 (10.2%) |
| 75-89th %ile | 5 (10.2%) |
| 26-74th %ile | 26 (53.1%) |
| 11-25th %ile | 7 (14.3%) |
| 1-10th %ile | 6 (12.2%) |
| Total Students | 49 |
| Mean | 28.2 |
| Standard Deviation | 6.88 |

Grade 2 Math Benchmark- Spring:

| Comparison: National | 2020-2021 |
|---|---|
| 90-99th %ile | 7 (14.9%) |
| 75-89th %ile | 12 (25.5%) |
| 26-74th %ile | 17 (36.2%) |
| 11-25th %ile | 9 (19.1%) |
| 1-10th %ile | 2 (4.3%) |
| Total Students | 47 |
| Mean | 205.1 |
| Standard Deviation | 37.33 |

## NWEA MAP Mathematics

Math: Math K-12

| Grade (Spring 2021) | Growth Count‡ | Comparison Periods | | | | | | Growth | | Growth Evaluated Against | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | | Fall 2020 | | | Spring 2021 | | | | | Grade-Level Norms | | | Student Norms | | |
| | | Mean RIT | SD | Percentile | Mean RIT | SD | Percentile | Observed Growth | Observed Growth SE | Projected Growth | School Conditional Growth Index | School Conditional Growth Percentile | Count with Projection | Count Met Projection | Percent Met Projection | Student Median Conditional Growth Percentile |
| 2 | 0 | ** | | | ** | | | ** | | | | | ** | | | |
| 3 | 44 | 197.7 | 10.8 | 94 | 206.4 | 12.2 | 79 | 9 | 1.1 | 13.0 | -2.05 | 2 | 44 | 16 | 36 | 34 |
| 4 | 47 | 207.9 | 15.8 | 89 | 217.1 | 15.4 | 81 | 9 | 1.0 | 11.5 | -1.15 | 12 | 47 | 15 | 32 | 33 |
| 5 | 46 | 224.5 | 13.6 | 98 | 229.4 | 17.7 | 90 | 5 | 1.4 | 11.1 | -2.65 | 1 | 46 | 15 | 33 | 24 |
| 6 | 46 | 222.9 | 14.2 | 85 | 227.5 | 15.0 | 71 | 5 | 1.4 | 8.6 | -1.82 | 3 | 46 | 18 | 39 | 38 |
| 7 | 45 | 230.3 | 14.4 | 88 | 233.0 | 14.9 | 75 | 3 | 1.3 | 7.0 | -2.08 | 2 | 45 | 16 | 36 | 27 |
| 8 | 45 | 235.9 | 19.7 | 87 | 239.7 | 19.8 | 82 | 4 | 1.1 | 5.6 | -0.73 | 23 | 45 | 19 | 42 | 37 |

Math: Math K-12
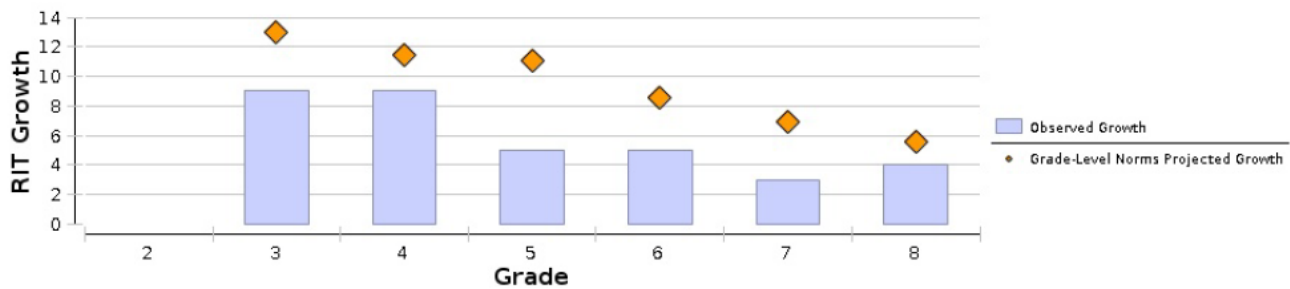
# Section H: Results of Corrective Action

# Section H - Results of corrective action

Students were identified for Title I services based on participation last spring, as traditional benchmark screening was unable to be completed in the remote learning situation. In total, 29 students in grades 1-4 participated in Title I Reading intervention ("ABC Club"), with one student exiting due to eligibility for special education. Nine students in grades 1-4 participated in Title I Math intervention ("123 Club"). A schedule was created in which students received small group or one-on-one intervention with an interventionist 2-3 times per week over Zoom. An attendance log was created to keep track of student participation. The obtainment of benchmarking data was variable; completing brief, "live" aimswebPLUS measures such as Oral Reading Fluency largely successful, but technology issues impeded the collection of math data which required the TestNav platform. Continual attempts to rectify the technology obstacles and communicate with families have been well-documented via email with the intervention team. Results of progress monitoring data which was collected indicates, among the students in grades 2-4 who are receiving reading intervention, 52% were showing a strong rate of improvement which is above their goal ROI and/or have consistently exceeded their goal. Data for one student was unable to be obtained due to very low attendance/availability on Zoom. Reading data for students in grade 1 was not yet comprehensive enough to be analyzed, and the aforementioned technology issues had impeded the collection of math progress monitoring data as well. Primary intervention tools that were utilized during this period include Leveled Literacy Intervention, Read Naturally, and Heggerty. The use of Wilson Fundations magnetic tile boards were utilized to give students a manipulative tool at home. Bridges math intervention strategies and resources were used for math intervention.

33 students in grades 1-4 participated in Title I services at PCCS between October and December, with 27 participating in Title I Reading intervention ("ABC Club") and 11 participating in Title I Math intervention ("123 Club"). Five students participated in both. During this period, one student exited both interventions by parent request, one graduated from reading intervention due to significant progress made, and three exited one or both interventions following eligibility for special education services. Students continued to receive intervention 2-3 times per week over Zoom with an interventionist, and attendance was tracked via Google form. Interventionists continued to use Leveled Literacy Intervention, Read Naturally, Heggerty, Wilson Fundations magnetic tile boards, and Bridges math intervention. Progress monitoring data was less than typical due to unreliability of internet connections and the impact on obtaining fluency measures, but some data was collected. It should, however, be interpreted within the context of aforementioned internet issues and the current remote learning situation. Of the Title I Reading students in grades 1-2, four were exhibiting a performance rate of improvement (ROI) near their goal, with goals set between the 35th and 50th percentiles. Of the Title I Reading students in grades 3-4, eight were showing a performance rate of improvement above their goal ROI, with goals set largely at the 50th percentile and some between the 25th-50th percentiles. Unfortunately math data continued to be inconclusive due to the difficulty consistently obtaining progress monitoring.

32 students in grades 1-4 participated in Title I services at PCCS between January and March, with 26 participating in Title I Reading intervention ("ABC Club") and 10 participating in Title I Math intervention ("123 Club"). Five students participated in both. During this period, one student qualified for special education services in math and exited 123 Club, and another was evaluated but did not qualify, so remained in ABC Club.

Four students were referred for case study evaluations. Students continued to receive intervention 2-3 times per week over Zoom with an interventionist, and attendance was tracked via Google form. Interventionists continued to use Leveled Literacy Intervention, Read Naturally, Heggerty, Wilson Fundations magnetic tile boards, and Bridges math intervention. Progress monitoring data was less than typical due to unreliability of internet connections and the impact on obtaining fluency measures, but some data was collected. It should, however, be interpreted within the context of aforementioned internet issues and the current remote learning situation. Of the Title I Reading students in grades 1-4, five were exhibiting a performance rate of improvement (ROI) above their goal ROI, and 14 were making at least 35% progress towards their goal, with 9 of those students making 50% or more progress towards their goal. All goals were set between the 25th and 50th percentiles. Unfortunately math data continued to be inconclusive due to the difficulty consistently obtaining progress monitoring. For several families, there has been ongoing email communication since early December, but the benchmark has yet to be completed, or was completed within the past couple of weeks. We indicated that we would be attempting more in-person progress monitoring with many students starting to attend some in-person instruction in the hybrid model.

31 students in grades 1-4 participated in Title I services at PCCS between April and June, with 25 participating in Title I Reading intervention ("ABC Club") and 9 participating in Title I Math intervention ("123 Club"). Four students participated in both. During this period, one student qualified for special education services in reading and exited ABC Club, and three were evaluated but did not qualify so remained in ABC Club. Students continued to receive intervention 2-3 times per week over Zoom or in-person depending on their remote versus in-person attendance, with an interventionist, and attendance was tracked via Google form. Interventionists continued to use Leveled Literacy Intervention, Read Naturally, Heggerty, Wilson Fundations magnetic tile boards, and Bridges math intervention. Progress monitoring data for some students was less than typical due to unreliability of internet connections and the impact on obtaining fluency measures, but there was an overall increase in data collection. It should, however, be interpreted within the context of aforementioned internet issues and the current remote learning situation. Of the Title I Reading students in grades 1-4, eight exhibited a performance rate of improvement (ROI) above or very close to their goal RoI. All goals were set between the 25th and 50th percentiles.