

Math & Bikes

Want to bring bikes into your math class? Here's how:

- **BikeWalkRoll - Hands-up surveys.** In each classroom teachers ask students how they got to school through a raise of hands. Use the survey format on www.bikewalkroll.org to record your data. Based on the data, a classroom could choose a winner for the student who biked the most. This could also be done as a competition between classrooms: for example, the class with the most bike trips to school wins a prize!

1. Gather your students.



2. Do a 30 second poll.



3. See the results.



4. Compare with the World!



- **Track your kms.** And “bike across Winnipeg, Mb, or Canada” (can be done as an individual or a class)
- **Bike Measurements!** As part of a lesson on measurements, have students estimate the following distances.
 - one to one-and-a-half metres (the proper distance from the curb for cycling).
 - five to six metres (the distance before an intersection at which a cyclist should begin to move to the right if turning right).
 - 15 to 20 metres (a good distance before an intersection to look over your left shoulder in preparation for making a left turn).
 - Consider working in pairs, with one student standing at each end of the length. Then show the actual distances to give them an idea of how accurate their estimates are.
- **Bikes and Cars.** Take students to a nearby street and have them guess how long it will take a car to reach a designated point. Make the connection between this activity and the decisions a cyclist has to make when entering an intersection.
- **Measuring stopping distance.** Have a volunteer (preferably an adult) ride a bicycle across the parking lot and then stop as quickly as possible. Measure the distance it took the cyclist to stop. Discuss with the class how this illustrates that a cyclist must look ahead for hazards to be able to stop in time. Repeat the activity with the cyclist traveling at various speeds. You may also have the students guess -before each trial – how many seconds it will take for the cyclist to stop completely.

Enjoy!