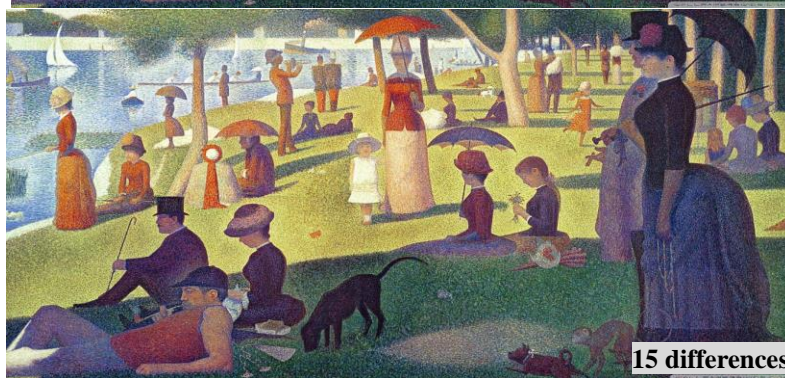
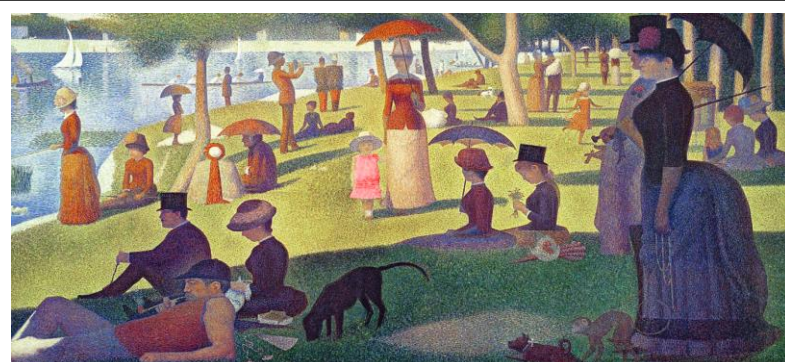


11/16/2015 (#25 this year)

We have another three-day weekend coming up at the end of the week. It is always nice to have a day off and relax but I wonder how many of you can actually¹ relax. I know the sixth grade are working hard for their university entrance tests² and all the other students have started to study for the tests in December. I'm sure your parents are working hard as well, and I know all of the teachers here at school are working hard. So, can we actually relax? I really hope so. Work and study is obviously³ important but it is not everything. We need balance⁴.

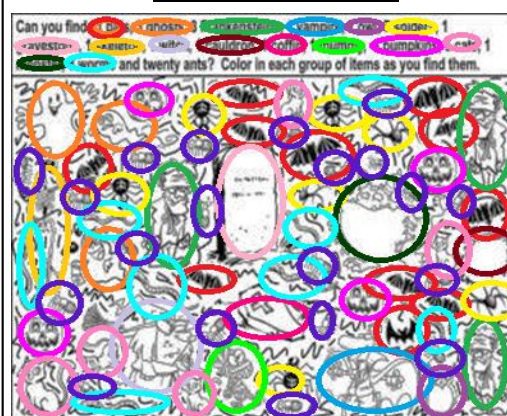
Something You Didn't Know (Comets⁵)

1. The word comet comes from the Latin⁶ "cometa" which, in turn⁷, came from the Greek⁸ "κομήτης", (komeetees), which means long-haired⁹ star.
2. Comets are made of rock, dust, ice and frozen gasses¹⁰. When they fly close to the sun the frozen gasses melt¹¹ and give the comet the tail¹² we can see.
3. We have identified¹³ 5186 comets but there are over 1 trillion¹⁴ in our solar system¹⁵.
4. Comets are different to asteroids¹⁶. Asteroids are pieces of rock which fly until they hit something. Comets are dust and rock frozen together and they can break up when they have exhausted¹⁷ their gasses.
5. Some comets have tails that can be over 150,000,000km long!



15 differences

Last Week's Answers



Announcements

Three teachers have demo classes on Wed so all of you (except those three classes) will go home early. The English department parents have a meeting on Thurs. The JHS have ball sports on Friday.

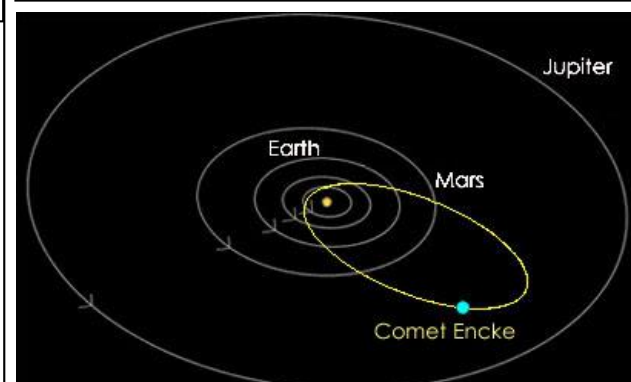
News

Shooting Star Display Over Sapporo

The Taurid meteor shower¹⁸ peaked¹⁹ last weekend with many shooting stars²⁰. They were visible²¹ in many parts of the world but in Japan, the sky was cloudy everywhere except²² Sapporo. Did you get a chance to see them? I went on my balcony with my daughter. She loves anything to do with space and it was cold but fun.



The Taurid meteor shower comes every year between October and November. This year they were brighter than usual. The meteors²³ are part of the tail of the comet Encke. Encke is a ball of rock, ice and gas that is about 4.8km across. It travels around the earth and Mars on an orbit²⁴ that brings it close to the earth. Sometimes it comes very close.



The tail of a comet is usually millions of km long²⁵. The tail is composed of²⁶ gas, bits of ice, small rocks and dust. The earth takes about a month to pass through²⁷ the tail and the rocks burn up²⁸ when they hit our atmosphere²⁹, causing the shooting stars. Sometimes big rocks burn up, creating very bright displays.



- 1.Actually 実際は 2.University entrance tests 大学入試 3.Obviously 明らかに
 4.Balance バランス 5.Comet 彗星 6.Latin ラテン語 7.In turn 順繰りに 8.Greek
 ギリシア語 9.Long-haired 長い髪 10.Frozen gas 凍ったガス 11.Melt 溶ける
 12.Tail 尾 13.Identify 確認する 14.Trillion 1 兆 15.Solar system 太陽系
 16.Asteroid 小惑星 17.Exhaust ~を使い尽くす 18.Taurid meteor shower おう
 し座流星群 19.Peak 最大になる 20.Shooting stars 流れ星 21.Visible 目に見え
 る 22.Except 以外 23.Meteor 隕石 24.Orbit 軌道を回る 25.Millions of km long
 数百万キロの長さがある 26.Composed of ~から成る 27.Pass through ~を通
 る 28.Burn up 燃え尽きる 29.Hit the atmosphere 大気にあたる