

What single building has 73 elevators and enough structural concrete to pave 200 miles of sidewalks? The Freedom Tower in New York City. Is it the world's tallest skyscraper? No. But it's the safest, newest, and most energy efficient. Let's learn more!

1. What city has the world's tallest building?

- a) New York City (USA)
- b) Taipei (Taiwan)
- c) Dubai (United Arab Emirates)

Answer: C. The 163 story tall Burj Khalifa in Dubai has been the world's tallest building since 2008, according to Wikipedia <u>bitly.com/2ivG3lD</u>. By comparison the Freedom, tower is quite a bit shorter, at104 stories making it the 4th tallest in the world as of 2016.

2. True or false. Do tall buildings sway in the wind?

Answer: True. But they are designed to move, in either wind or an earthquake. Tiapea 101 for example has a giant ball hanging inside it's hollow core. See what happens during an earthquake, at https://youtu.be/NYSgd1XSZXc

3. Which skyscraper has the best observation deck?

The best might just be Sears Tower, with it's the Observation Ledge. It's made out of glass and it comes with a dare... can you go to the ledge? See for yourself, at http://theskydeck.com/

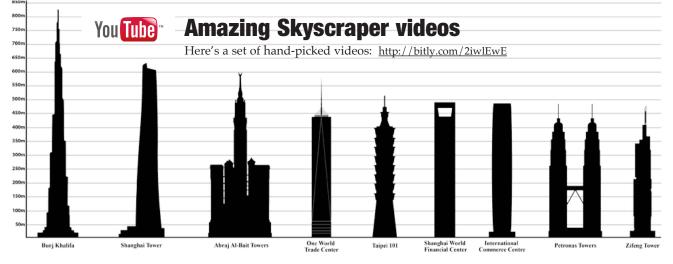
4. Has anyone ever jumped off the top of a skyscraper and lived?

Yes, as long as they have a parachute. In 2008, two French daredevils jumped off the 160th floor of the Barj Khalifa with a video camera. Have a look <u>https://youtu.be/9pGp1LX8yZY</u>.

5. Do skycrapers get hit by lighting?

All the time. They act as giant lightning rods during storms, transferring the energy to the ground. So people are not harmed. Here's the Sears Tower in Chicago getting struck by lightning. <u>https://youtu.be/IJGE510BAms</u>

APPLICATIONS: Try to build your own Skyscraper in Minecraft <u>http://bitly.com/2iwPEsh</u> or out of spaghetti and marshmallows, at <u>http://pbskids.org/zoom/activities/sci/tallsturdybuilding.html</u>. Next download Tinybop's well designed app, called Skyscrapers by Tinybop. <u>http://reviews.childrenstech.com/ctr/fullreview.php?id=19283</u>



LittleClickers is made possible by Safe, fun Internet for children Computer

LittleClickers is brought to you by Computer Explorers, who offer camps on programming.

Visit <u>www.computerexplorers.com</u> to learn more. The web-based (html) version of this page is at

http://www.littleclickers.com with live links, plus a place to report any errors. Note that *CTR* and COMPUTER EXPLOR-ERS do not have commercial interests in the sites listed on this page. Librarians and teachers are permitted to copy this page for non-profit use. To suggest a future topic, or to report a bad link, please contact the editor, Warren Buckleitner [WB] warren@childrenstech.com or call 908-284-0404 (9 - 3 PM, EST).

> Do really tall buildings ever get hit by lightning during thunderstorms? (Yes.)

> Has anyone every jumped off the top of one and lived? (Yes, but they used a parachute, and they landed in jail.)