**IGN Code Foo**

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**Q1.** Okay, well first of all I’m not from the U.S, I’m from Ireland and our average sized school bus is probably the equivalent to your mini-van. So, I had to look it up.

According to a quick Google, dimensions are:

* Width: 8ft
* Height: 6ft
* Length: 20ft

At this point I drew a little doodle in my copy of a bus just to see where the dimensions would be and because I like a good doodle.

Okay, so once again being European I had to quickly convert feet to metric system. It’s what I’m familiar with. ☺

So for every foot – its 0.3048m

Perfect! So changing my dimensions:

* 8ft – 243.84cm
* 6ft – 182.88cm
* 20ft – 609.6cm

So then the Volume of the bus will be all these multiplied together which is 27184173 cubic centimetres.

Now, let’s take a quick look at a ping pong ball (would have preferred snooker or pool ball, I’m not very talented at ping pong).

So the diameter of a ping pong ball is – 4cm

Which means Radius is – 2cm

Using the formula to find the Volume of a Sphere = ( )

We find that the Volume of a ping pong ball is 33.51 cubic centimetres.

**Additional Factors:**

Okay, I could be wrong in doing this but this is how my mind works. Now, there are seats on a bus so I would presume at least a third of the space would be taken up. So removing a third of the room on the bus (9061391 cubic centimetres) from the total, we have 18122782 cubic centimetres remaining.

What about the fuel tanks on those big yellow buses, I would have to presume a large amount of space is in there. So using my friend Google again, I find the average space in the fuel tank is enough for 60 gallons of fuel. So this is equivalent to 227124.70 millilitres and in turn is the same in cubic centimetres, which gives us the volume for our tank!

**My Answer:**

Well based on my additional factors I will divide the volume of a ping pong ball into the remaining space on the bus which gives me 540817 ping pong balls.

Doing the same with the fuel tank I can fit 6678 ping pong balls.

So in total I THINK I can squeeze 547595 ping pong balls on to an American bus. But please don’t ask me to try!!