Kenneth, your script is a good start, but needs some more meat on the bones. You can shorten the introduction and a few other places where things get a bit repetitive, and use that extra space to expand on some of the really weird/amazing theories behind time travel. As a general audience member, I knew a lot of what you were saying below, so I think you need to add information or a new perspective or something - surprise/amaze/wow the audience! Good luck.

Kenneth, I agree completely with Ceri’s last comment at the end of this document. Ditto George’s comment above, too.

Once upon a time (in the year 2009), Stephen Hawking held a party with all the usuals, wine, hors d’oeuvres, and yet, no one turned up!

<Show party setting>

You’d thought that he’d be upset

<show stephen hawking with sad face>

But it turns out that he was far from it

<show sad face turning into smiling>

He had in fact only sent out the invitations to the party after the party had happened, and had addressed it to all time travelers of the future. He did so in an attempt to prove his own theory, that

TIME TRAVEL WAS NOT POSSIBLE!

No party-goers, meant no travelling back in time!

Or were people of the future just too cold for Hawkings?

 Is time travel possible then?

What exactly is time travelling?

When we think about it, we’re all actually time travelling, but not how you might expect

What we are doing is to time travel at a rate of 1hour per hour, which means that for every 1 hour we experience, 1 hour passes around us! (Makes sense, right?)

In the year 1905, Einstein proposed that when we travel at extreme speeds, time around us actually slows down, and that we could experience time at an “accelerated” rate.

In other words, when we are travelling at a high speed for an hour, the world around us could be experiencing time at a much faster rate, for e.g. 7 hours could have passed.

This has been seen in many sci-fi movies, the most recent of which would be in Interstellar, where Anne Hathaway and Matthew McConaghey’s character descends to a planet where time passes a lot slower than the rest of the universe around them.

Based on some of Einstein’s math, if we travel at a speed of approximately 90% the speed of light (number appears on screen), a year to us would seem like 2.3 years to the rest of the world.

This means that should we invent a space ship which could travel at a speed of 0.9c, when we take a year trip in it, all your friends and family would have aged 2.3 years in that period!

<insert little animation of a space ship taking off and coming back, to see a infant turning a toddler on earth, while an infant maybe remains as an infant on the ship)

Travelling at 0.99c, this number becomes 7 years. In fact, the faster you travel, the slower time around you would slow down.

What about travelling back in time? Can we run backwards with incredible speeds to be able to go back in time? Doesn’t sound really possible does it?

<flash the FLASH running backwards across the screen>

How about, travelling faster than the speed of light?

In fact, that’s one of the possible theories of reverse time travelling, that we would need to travel faster than the speed of light.

Part of einstein’s initial proposal when he talked about time dilation (which is travelling at high speeds to slow down time around us), was that it was not possible for us to travel at speeds faster than the speed of light.

Why?

Another effect of Einstein’s theory of relativity , is that when we travel at high enough speeds, time and space aren’t the only thing around us that changes. One other factor which changes with high speed, is the mass of the object!

With more mass, it takes a lot more energy to move the object at the same speed, and as we approach the speed of light, the amount of energy required would be wayyyyy too great

Even if we did manage to put in more energy, we might not be actually increasing the speed, but merely making the object heavier, and heavier.

Is it thus really impossible to travel back in time? We know we can travel forward (not efficiently), and maybe science has just not yet uncovered the holy grail of it all. Maybe one day, we would encounter time travelers, and know more about how possible or impossible this feat could be.

In the meantime though, I guess we could continue hosting more time traveler parties in hope that one of them would finally see a guest from the future.

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