Near-death experiences give us more precious clues (in addition to the findings of Darwin, Einstein and Whitehead) about why shutting yourself off is against our nature. Many near-death experiences report a light at the end of a tunnel. They were directed to that light at high velocity with a feeling as if their self would dissolve.<sup>73</sup> That light embraces everyone in pure compassion and love. For example, Craig reports after he had nearly drowned: "It was like a tunnel, but it was so dark that it could have been five feet in diameter or thousands of miles. I seemed to be picking up speed ... I felt as if I were moving at the speed of light through the blackness, and far away in the distance, I could see a small pinpoint of light that seemed to be growing larger; I felt as if I became one with the light. It seemed to have knowledge of everything that there is to know, and it accepted me as part of it. I felt all-knowing for a few minutes. Suddenly, everything seemed to make perfect sense. The whole world seemed to be in total harmony."<sup>74</sup>

A lot has already been written about near-death experiences.<sup>75</sup> I've also discussed the possible causes and phases of this interesting phenomenon in detail in several books<sup>76</sup> and won't repeat myself here. But one thought is important to me: Only someone who has had a near-death experience can be the best judge about what was experienced. Conventional medicine is grossly negligent when it does not take affected people seriously and dismisses their experiences as hallucinations. When a man has a cardiac arrest and learns for the first time that his alleged father isn't his biological father, and if that turns out to be true after reanimation,<sup>77</sup> then his experience just cannot be fantasy! The fact that we still don't understand near-death experiences scientifically is no proof that they are just hallucinations. It only documents our lack of knowledge. Sound science always takes *all* possibilities into account before rejecting or excluding any of them. In the following pages I will demonstrate how we can interpret the tunnel experience at near-death from a physical standpoint.

## The Searchlight Effect

Let's assume it's a still day in the middle of the winter and it's snowing. You are sitting in the front seat of a car and travelling at a high speed with snowflakes falling. Someone who observes the scene from the side of the road sees a car that is moving for example from left to right (see figure 37 top). And he or she sees snowflakes falling vertically from above to below because the wind is still. Compared to the car moving at a high speed, the snowflakes fall slowly indicated by shorter arrows.

What does the same scene look like from your perspective in the car? Well, the car isn't moving at all relative to your body. Instead, everything outside of the car is moving past you—the landscape and all the falling snowflakes. Because the relative speed between car and snowflakes is independent from perspective, you project the speed of the car onto the speed of the snowflakes: From your perspective, the snowflakes are falling at a high speed *and* slanted onto the windshield (the arrows in the bottom of figure 37 are longer). For you, their speed consists of a vertical component ("relative to the sky") *plus* a horizontal component ("relative to the car").

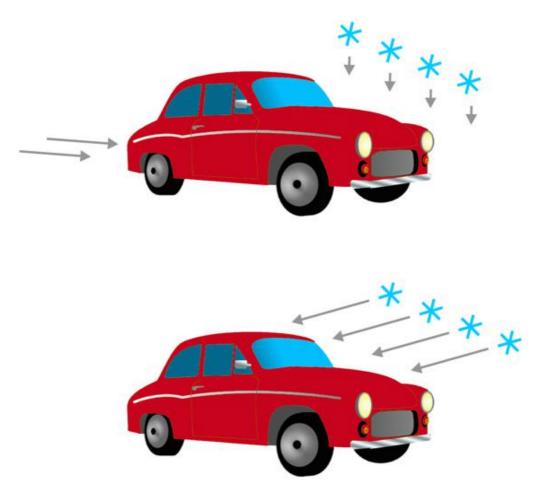


Fig. 37: Analogy to the searchlight effect

What you just read is an analogy to an effect of Einstein's theory of relativity that isn't as well-known as the relativity of space and time: *the searchlight effect*.<sup>78</sup> But it is just as fascinating! Let's simply replace the snowflakes with light and the car with a rocket: From an perspective outside of the rocket, light hits the rocket from all directions (see figure 38 top). From the rocket's perspective, all surrounding light rushes in from the front—bundled like a spotlight (see figure 38 bottom). Arrow length doesn't change here since the speed of light is constant. A passenger in the rocket sees almost all darkness to the left and right; most of the light is approaching from the front. So he is indeed looking into a dark tunnel with a bright light at the end of it.

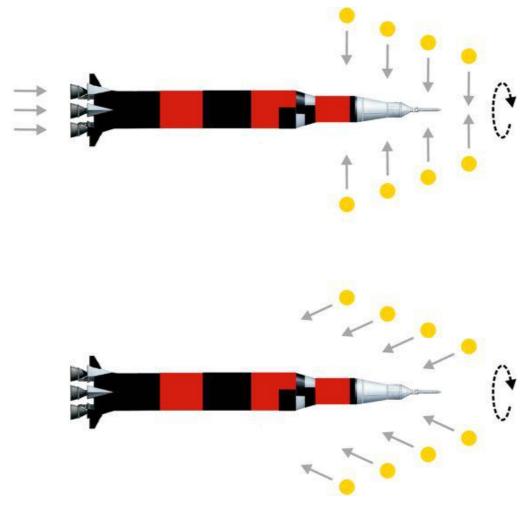


Fig. 38: The searchlight effect

On the following double pages you will get an impression about how the searchlight effect becomes noticeable when travelling at almost the speed of light. What you see here is a flight through a historic district of half-timbered houses in Tuebingen, Germany.<sup>79</sup> The pictures show simulations based on Albert Einstein's theory of relativity. They were kindly made available to me from the Institute of Theoretical Astrophysics at the *University of Tuebingen*. The computations that these pictures are based on are physically exact which means that they take into account a finite speed of light (therefore a finite light travel time) and the searchlight effect. For a better understanding of the figures 39a-d and 40a-d, I have added some extra clues for you:

1) In physics and in the figure captions the symbol c denotes the speed of light.

2) The snowflakes hit the windshield of a car slanted from the front only while it is moving. If it's standing still, they fall mainly on the hood and not on the windshield. Analogously, the searchlight effect doesn't become noticeable until the rocket is flying. In figure 40a the rocket is standing still which means that light only directly ahead hits the front of the rocket. This light is weak compared to all of the surrounding light on which the brightness of figures 40a-d is scaled. That's why figure 40a appears black.

3) The bending of house fronts is a result of the finite light travel time. Now take a careful look: The light that was reflected from the ground floor of each house reaches the rocket in earlier time than the light from its roof. But in the meantime, the rocket is moving ahead.

4) The scenes were zoomed-in as the speed was increasing to account for the forward motion while the rocket is in flight. The position of the observer moves from picture to picture toward the center of the pictures.

5) I have published similar pictures from a flight over a sunflower field in an earlier book.<sup>80</sup>

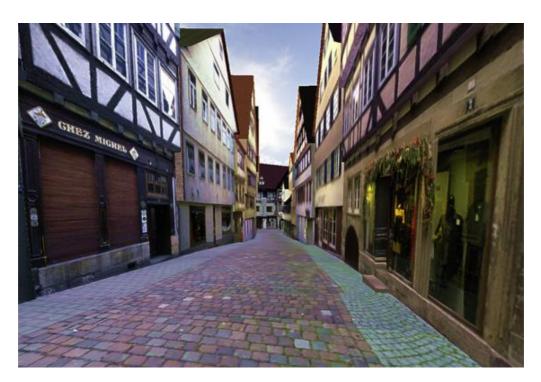


Fig. 39a: Flight without searchlight effect (0 mph)



*Fig. 39b: Flight without searchlight effect (75 % of c)* 



Fig. 39c: Flight without searchlight effect (95 % of c)



*Fig. 39d: Flight without searchlight effect (99 % of c)* 

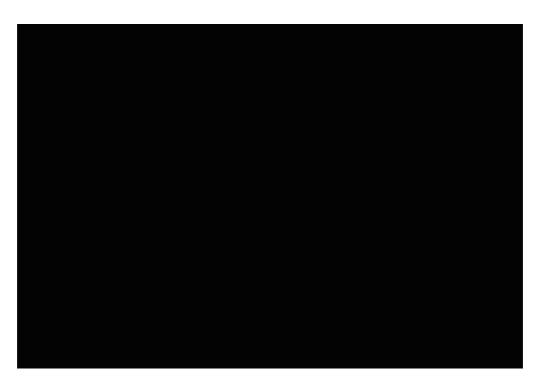


Fig. 40a: Flight with searchlight effect (0 mph)

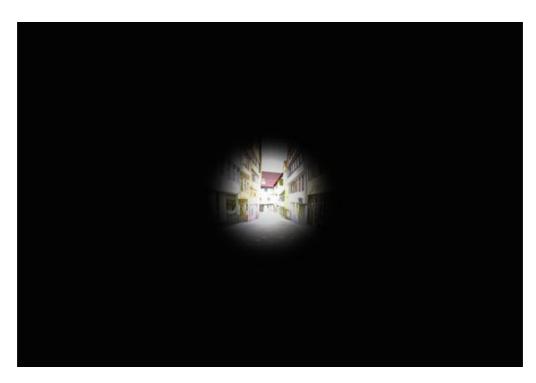


Fig. 40b: Flight with searchlight effect (75 % of c)



*Fig. 40c: Flight with searchlight effect (95 % of c)* 



*Fig. 40d: Flight with searchlight effect (99 % of c)* 

The searchlight effect doesn't prove that near-death experiences are real, but it presents to us for the first time a possibility to interpret the tunnel described in many neardeath experiences from the affected person's point of view. But what could accelerate like a rocket while someone is dying? Not the body, for sure, with all of its sensory organs. If it isn't matter, it must be something spiritual—a "soul" for example. I truly believe that all living things have a soul that goes into light while they are dying. But for a long time I did not understand why our souls should go into light if every self is mortal. Today I believe that our souls are drops of experience in Whitehead's sense that unite with the soul of the world, Brahman, to pass on information-like drops of water that unite with the ocean. What I can't explain is how the soul distinguishes between "light" and "dark". It's possible that a dying brain is still capable of doing this. *Near*-death is not the same as *after*-death.

A soul "going into light" does not only account for the tunnel experience—there's more. We can explain how the *life review*<sup>81</sup> emerges that has been reported by many affected people: When going into light my soul "bathes" in all scenes that occurred previously in my life. Here the memory effect of light makes itself felt very clearly. During the life review I am faced with my own life. I get mirrored with all the love that I gave to others and all the pain that I caused to others. No God will judge me on doomsday, but everyone will be his or her own judge, as soon as he or she views his or her life in the light of the big picture. Just think about it and you will realize that justice cannot be any fairer nor any more "divine" than this!

We shouldn't jump to conclusions regarding the tunnel experience, the life review and a soul plunging into lightbut it is very plausible because many people who have had near-death experiences claim that they rushed through a tunnel at a very high rate of speed. Craig even refers to it as "the speed of light". Is it just coincidence that the searchlight effect makes itself felt only at high rates of speed? If this is correct, then is it still coincidence that there is light at the end of a tunnel? As I have explained, the perspective of light can be viewed as eternity itself. The tunnel is a kind of "bridge" to eternity. And if this idea about dying fits well by chance again, is it still fate that material things can never catch up to the speed of light—but something spiritual in us would reach the speed of light? So it would be worth the trouble to strive in life toward nonmaterial values like love and understanding? I must be honest: It is difficult for me to believe that all of this is only coincidence. It's very likely that there is something very real going on here. This is why I am convinced that near-death experiences are real.

Someone could claim that near-death experiences can't be real because not all affected people report a tunnel experience or a lifetime flashback in retrospect. The American investigator of near-death Kenneth Ring suggests to divide these experiences into different stages.<sup>82</sup> Any encounter with a bright light and the life review would have to be an overwhelmingly advanced experience that moves very close to death and opens the door to eternity. This is why it is not very likely that affected people report light at the end of a tunnel or a life review if resuscitation attempts occur in earlier stages of the near-death experience.