

## A Day in the Chernobyl Death Zone



### A Photographic Travel Report by Beatrice Staub

It is possible that you are wondering how I ever came upon the idea of travelling to Chernobyl. It was whilst I was focussing on the theme of "dust" as part of my photographic work that I struck upon the idea of spending a day among the contaminated radioactive dust in Chernobyl. I came across an advertisement on the internet for a photography tour that is run by the LIK Photo and Design Academy in Vienna. The Director of the Academy, qualified engineer Nadja Gusenbauer, was born in Kiev and has established all the right contacts. Along with Course Director Eric Berger, she has put together a fascinating photography tour. The highlight of the trip was the day we spent in the Chernobyl exclusion zone.

Chernobyl is undoubtedly the most famous place in the Ukraine. This is due to the catastrophic explosion of the No. 4 Reactor at the Chernobyl Nuclear Power Plant. The disaster altered people's perception and relationship with nuclear energy across the world overnight. Chernobyl became synonymous with our inability to completely control atomic energy.

Where are Chernobyl and the exclusion zone located precisely? The border of the exclusion zone is just under 70 kilometres north of Kiev as the crow flies and the town of Chernobyl is 100 kilometres away. From here, it is a further 5 kilometres to the edge of the Death Zone and then another 10 kilometres to the nuclear reactor. The ghost town Pripyat is located 5 kilometres away from the nuclear power station.

## What do I need to take on a trip to Chernobyl?

Sturdy shoes  
Long trousers  
Long-sleeved tops  
Headwear

## Itinerary

Our day starts in **Kiev** with a check of all the documents necessary for the trip. Each person receives a dosimeter and every other person is issued with a Geiger counter. A special guest accompanies us on our tour; Alexej Breus is an engineer who worked on the ill-fated reactor four days after the disaster. He told us a great deal about what actually happened back then. He explained that a lot of misinformation was disseminated and that they had to keep any information to themselves.



## Alexei Breus: the last man in the control room

When core meltdown was triggered in the reactor, it was up to Alexej Breus to prevent complete nuclear meltdown. Unfortunately, the engineer's high-risk efforts failed. Alexej frantically pressed the buttons in the control room, but he failed in his attempts to stop the horrifying nuclear meltdown.

Alexej reflects on the causes of the accident, "The engineers and builders should not shoulder all of the blame for the accident. It actually had more to do with general negligence and the failure to take responsibility." The Fukushima nuclear disaster in 2011 has demonstrated that accidents like this can also occur in highly industrialised countries such as Japan and not just in the former Soviet Union.

Alexej was born in South Russia in 1959 and moved to Prypiat near Chernobyl in 1982 after he completed his studies at the Bauman Moscow State Technical University. "I made my final decision when a girl on roller skated bumped into me when I was out for a walk. My wife Galina asked the girl whether I should go to Chernobyl or to Podolsk. She answered 'Chernobyl' – and so the decision was made." His wife was working in Leningrad (now St. Petersburg) when the accident happened. "Thankfully!"



After the disaster, he found a new job in Kiev with the Soviet Nuclear Regulatory Committee. He completed a course in journalism in Kiev in 1990 and then went on to work for the official parliamentary

journal and then for a news agency. He also discovered painting in his spare time. As a journalist and a member of the Strontium 90 art group, he has travelled to the Death Zone around 100 times. The main focus is nature conservation. He left his job as a journalist in 2015 and has made a living from his art and lived off his 170-euro Chernobyl pension since then. "If my health permits, I want to write a book about that fateful Saturday which completely changed not only my life but the lives of many other people." he explains. Experts estimate that

the disaster, which took place on 26 April 1986, claimed the lives of tens of thousands of people. The radioactive cloud moved across Belarus in a westerly direction. Alexej does not complain as the state of his health is what is normally expected for a person of his age. He does not mention possible long-term effects. "It could be worse," he explains quietly with a smile.



## Time to Head Off

We climb aboard the bus and set off. Despite the hot weather, we have to wear long trousers, long sleeves, long socks and sturdy shoes. It is important to ensure that as little skin is visible as possible. The journey took considerably longer than the linear distance I mentioned would imply. The roads are very bumpy and it took us 1 ½ hours to reach the first checkpoint: Checkpoint **Dytiatky**. We had to get off the bus here and were individually checked again. We were told that we were not permitted to take photographs at the checkpoints. Eating, drinking and smoking are not permitted outdoors inside the zone. You are not allowed to touch anything or place anything on the floor. You are also not permitted to churn up the dust or to leave the tarmacked routes. We are still wearing head coverings and have covered ourselves with insect repellent cream or spray. There are masses of horseflies which are nearly twice the size of the ones we have back home. We arrive at the next checkpoint, **Checkpoint Leliv**, feeling somewhat queasy. This is where the Death Zone begins. All the Geiger counters are already beginning to beep. We travel along the Prypiat River. We can see reactor towers 5 and 6 that were under construction at the time of the accident. We can see the nuclear power plant with the new sarcophagus. Even though it has been completed, it will not go into operation with all its special features until the end of 2018.



Our guides are already waiting in front of the nuclear power station. We have to go through the safety instructions and checks again. We then enter the reactor for one hour. We reach a cloakroom via a bunker complex where we are given protective footwear, head coverings, coats, gloves and breathing masks.

We are led through some corridors past control rooms, pipes and safety equipment. The floor is wet in parts, the windows have not been cleaned in 32 years and it is possible to get a glimpse of other parts of the power plant. We pass sealed doors and warning signs. Then we reach the point where Reactor No. 4 could be accessed before the disaster. Reactor No. 4 was where the explosion occurred in 1986. There is a memorial here which commemorates a worker who lost his life saving others. All that was left of him were his handprints in the cooling debris. This leaves me feeling totally depressed.

We then continue on to the control room attached to Reactor 3 which is similar to the Reactor 4 control room. This is where Alexej used to work until he was relieved of his duties because he had reached the

maximum level of radiation he could be exposed to. Electricity will never be generated and distributed in Chernobyl for the Ukraine again. However, workers are still completing work on the sarcophagus. They work 12-hour days for 14 days at a time and then they return home. We have to go through a radiation control point before we are allowed to leave the nuclear power station. A

model in the visitor centre demonstrates to us again how the disaster took place and a video explains the construction of the second sarcophagus. A memorial stands in front of the visitor centre.



## The Chernobyl Sarcophagus

A few months after the nuclear disaster in April 1986, Soviet construction workers built a protective shelter around the remains of the reactor out of 7,000 tonnes of steel and 410,000 cubic tonnes of concrete. The aim was to prevent further radioactive material from escaping into the atmosphere. The construction work was completed in November 1986. However, it quickly became apparent that the shelter would only last for a maximum of around 30 years. When the sarcophagus began to leak and the steel girders to rust, a replacement had to be built. Work has taken place on the "New Safe Confinement" structure since 2010 following years of preliminary work. The new structure covers the original protective shelter and has been built with the help of international financial aid. It is expected to last for 100 years. It was moved from its assembly point to its final resting place enclosing the original shelter. The project was finally completed at the end of May 2018.

## Prypiat

We now continue on to **Prypiat**. We pass another checkpoint. There are lots of checks because a large number of stalkers make illegal trips into the zone. We also encounter police officers in Prypiat. Alexej used to live in the town which was constructed in 1970 and equipped with every luxury to accommodate



the workers from the power station. Approximately 49,000 people used to live there (including 15,000 children) and the average age was 26. Two days after the disaster, all the inhabitants of the town were evacuated on 1,100 buses in 2½ hours. Nature has now reclaimed everything back. There is not much left of the

buildings that once stood there. A great deal of looting and vandalism took place. It is now too dangerous to enter the buildings as they are in



such a dilapidated condition. We visited the outside of a school, the

department store, the community centre and the Palace of Culture. We also stood inside the stadium, the amusement park, the swimming pool, the music school and the cinema. As we left the town, we caught sight of a fox and a wolf. It is very unnerving and not possible to convey this atmosphere in a single photograph. You need to see/feel it for yourself. The Geiger counter beeped erratically.



## Kopachi

We got on the bus again and continued on to **Kopachi** one of the places that was levelled to the ground after the disaster because the soil was so heavily contaminated. Only the kindergarten and a few stone houses remain here. Kopachi was once a flourishing village located 3.8 kilometres from the Chernobyl Nuclear Power Station. We visited the kindergarten and this turned out to be the place that moved me the most. We could only stay there for a very short time because the soil here is so heavily contaminated.

## **Duga-3**



The final stop in the zone is **Duga-3**. This is an impressive radar array which was part of the Soviet over-the-horizon radar system.

We had to go through two radiation checks from this point. By the end of the day, we had been exposed to slightly below the level of radiation you would normally receive when you have your teeth x-rayed. We were lucky that it had rained heavily the night before our visit which meant there was hardly any (radioactive) dust in the air.

## **Conclusion**

A fascinating trip which has left behind impressions that radiate within me and which are very difficult to fully describe in a visual way.