## Extract from Hansard

[ASSEMBLY — Thursday, 18 May 2023] p2528b-2530a

Mr Peter Rundle; Mr Bill Johnston

## WESTERN POWER — POLE-TOP FIRES

Grievance

MR P.J. RUNDLE (Roe — Deputy Leader of the Opposition) [9.38 am]: I thank the minister for taking my grievance today on pole-top fires. Pole-top fires are becoming an increasing menace in my electorate of Roe. Pole-top fires have been around for decades, and while government strangles the funding of Western Power, reducing the money spent on infrastructure maintenance, we will see even more growth in the number of these incidents.

In Western Power's recent State of the infrastructure report 2021/22, it is acknowledged that the major cause of pole-top fires is leakage current, and these fires can spread to the ground or cause network outages. The report states -

Leakage current is electrical tracking from an energised conductor at the top of an insulator through an earth connection across an insulator surface. This electrical tracking can be caused by defective insulators or insulator surfaces being contaminated with pollution, in conjunction with surface moisture from sources such as mist, dew or light rain.

The report reveals that 382 pole-top fires occurred in the reported years of 2021–22. This was by far the greatest cause of failure performance in structures throughout the network.

This is not news to the farmers whose properties have been burnt out by fires caused by pole-top fires. Recently, I received correspondence from a local senior bushfire control officer in command of approximately 350 volunteer bush fire fighters in his shire. This year, five bushfires on the Western Power network have been started by pole-top fires, putting firefighters, the general public, buildings and properties at risk. Another fire control officer rang my office to say they had had enough of the pole-top fires, with 30 incidents in the Lake Grace shire, six in Kulin, and five in Pingaring. Apart from the frustration at the constant call-outs, they are having to wait for hours for Western Power crews to come out, without water, to deal with the situations.

On one occasion, it took five hours for Western Power to attend a burning pole. Upon arrival, they used the water from the attending volunteer, left the area and the fire reignited the following day, starting a bushfire that the local volunteers had to put out. I hear too many stories of farmers remaining at pole-top fires for hours to monitor them and put out sparks until the Western Power crew turns up. I am sure the crews are doing their best, but this is unacceptable.

This summer there were 14 pole-top fires in the Wagin shire. My office received plenty of phone calls from farmers sitting in paddocks, watching the lines sparking and causing fires. Following these fires in Wagin, the shire president voiced his concerns to the Economic Regulation Authority. I am told the response was, "We create regulations; we don't police them." A further question to the Department of Mines and Energy Safety on the rollout of replacement insulators was unanswered. The terrible fire in the Narrogin and Wickepin shires last year devastated 18 000 hectares and threatened the town of Wickepin. It was one of two fires that destroyed 60 000 hectares of farmland across several local government areas after igniting on the same day. Although the Corrigin fire started from other sources, the Narrogin fire started from overhead power lines coming together in windy conditions. In other areas of the state, more than 1 000 firefighters battled four simultaneous level 3 emergencies. Planes were deployed, and they made a huge difference. The career firefighters and volunteers were all put at risk because of these fires.

Fires start for a range of different reasons. We do not need fires starting from government infrastructure on top of the existing risks. I raised the issue of insulators with the Minister for Energy. I gave him information regarding line post insulator slanted sheds, which the manufacturer already supplies to Victoria, South Australia, the Northern Territory and Queensland. I am told that water dispersion plates should be fitted to all poles, regardless of insulator type, and that Western Power has not been fitting them for some years. The infrastructure report says that approximately 64 per cent of the network's distribution overhead conductor population is more than 40 years old. This is an issue that has been happening for decades.

In the past, there has been cleaning of poles and insulators. If this is revisited, it could mitigate the risk of dirty insulators experiencing a misty rain event, causing a devastating fire during the summer months, until Western Power adopts a new insulator policy that negates the need for cleaning. I understand this practice was suspended in 2020 after a worker was injured, which is understandable. However, it is three years later and I would like to know whether Western Power has reviewed the situation. Investment in risk mitigation and a review of the insulators and water dispersion plates would save lives, properties, livestock and assets. Minister, I have had enough of farmers contacting me throughout summer and autumn, having to look after these pole-top fires that are jeopardising their farms and communities through no fault of their own.

MR W.J. JOHNSTON (Cannington — Minister for Energy) [9.43 am]: I thank the member for his grievance. Pole-top fires is an important issue. Western Australia is unique in the world due to our overhead infrastructure, particularly in rural areas. To give an example, in California, to mitigate the risks in summer, they switch off the

## Extract from Hansard

[ASSEMBLY — Thursday, 18 May 2023] p2528b-2530a Mr Peter Rundle; Mr Bill Johnston

electrical infrastructure so that people in large parts of the state do not have access to grid-based electricity. We do not want to do that in Western Australia because it would mean that people would have to provide their own electricity for large parts of the year. In addition, we have a peculiar environmental circumstance. We are a large state. The south west interconnected system runs through a larger area than almost any other distribution system.

I have to make clear the difference between high-voltage and low-voltage distribution systems. The high-voltage distribution system is extremely reliable. There is rarely any trouble with that.

It is the low-voltage distribution system. When the State Energy Commission was established many years ago and took over the operation of the electricity system from local government, the low-voltage distribution system was rolled out across Western Australia. It was an engineering marvel that these poles and wires were able to be run across long distances. It is called earth return. At the time it was done, nobody in the world believed it was possible for a wire to go in one direction and not both directions. Most people believed, from an engineering point of view, that it was technically impossible.

As the member said, pole-top fires is a recurring problem. It was a problem when I was the shadow minister and a problem now when I am a minister. The member correctly pointed out that in 2020, we stopped the siliconing and pole washing. That happened because, in January 2020, a Western Power employee was injured while undertaking land-based siliconing and washing of live lines. This is the best way forward because if the line is de-energised to do siliconing and washing, people lose their power. Western Power looked globally at whether there is another way of doing the line washing, because we cannot go back to land-based work. That process was welcomed when the former government was in position and I was the shadow minister. There are two things about that. Firstly, the siliconing did not last as long as expected. The experience in other parts of the world was that the siliconing would last over a decade. In Western Australia, it has shown not to last that long because of the peculiar circumstance of environment in this state. The second thing is we cannot do it in a live format because of the safety risk.

Western Power has regularly, over many years, used helicopters to wash the high-voltage transmission lines. That is a safe method because someone is not attached to the ground and therefore there is no risk when they wash the lines. Western Power is using helicopters to wash the distribution system. That is unique in the world. It is a major advance, but it comes with its own risk management challenges, because the helicopter is flying at very low altitudes in high-risk environments. It is not as simple a solution as the previous ground-washing methodology. It cannot be used in every single location that ground washing was previously used, but it is a significant improvement on no washing at all.

In some coastal areas—not necessarily in the member's electorate—where the challenges of pole-top fires are even higher, we have done the washing by de-energising the line. That led to some complaints from people who do not like losing power for a day while we do the line washing, but it overcomes the problem of power loss due to the environmental circumstance leading to the pole-top fires. We are deeply aware of the challenges of pole-top fires. Statistics show that pole-top fires come and go—some years are bad and some are better. Often that is about environmental circumstances beyond Western Power's control. Even when doing line washing, a nearby bushfire that is unrelated to the infrastructure can sometimes lead to having dust on the line, which is what causes the pole-top fires in the first place. Therefore, even washing in silicon is not a silver bullet. That is one of the challenges of providing electric power in regional areas. Another challenge is that in a more densely populated area, we can have two circuits; therefore, if we lose one side of the circuit, the other side of the circuit is still available to us. That is why in parts of the state that have very long line runs, like in the member's community, more outages are inevitable. That is a function of geography; it is not a function of choice.

I cannot speak to the Economic Regulation Authority because it does not answer to me; it answers to the Treasurer. I would expect the ERA to have oversight over the decisions it makes, and I am sure it does. Safety challenges, are regulated by the Department of Commerce. It would be a conflict of interest if I were also the minister who looked after Energy Safety, so that comes under the Minister for Commerce. Obviously, I cannot comment on that. Western Power acknowledges the challenges. We are investing in it. We are using new technologies, and we are seeking to use new insulators to make sure these challenges are reduced.