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NSW Independent Bushfire Inquiry Secretariat

Submission by:

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Thank you for the opportunity to make a submission to this important enquiry, I wish to preface my submission by paying respect to the families, friends and communities of those who tragically lost their lives during these catastrophic events. Also preface that any commentary submitted is not in any sense intended to be critical of Government, or any agencies sanctioned by any Federal or State Governments. To the contrary and in retrospect, I believe that Government and agencies at all levels performed very well during the recent fire events of 2019/20.

I am not a member of the RFS, however, through a charitable organisation that I support being RRT (Rapid Relief Team), I have attended many bush fire events over many years and locations across NSW, Of course most notable the 2019/20 catastrophic events where I was involved in both food catering and bulk water supply across the Blue Mountains area, then later at Wingello and Tallong. I have personally contributed 'in kind' many 10's of thousands of dollars of equipment and associated operating costs, as well as very substantial direct charitable donations to RRT. I view it as a privilege to be able to provide direct tangible support to people and communities that are less fortunate, it is something that I am in a position to be able to do, Personally, it is rewarding to see the results of this input achieve tangible results.

What I have observed over many years and many different locations across NSW is that the fundamentals of sourcing water for bush firefighting has not changed much in 50 years. Yes, we have better assets, trucks, pumps etc, better intel utilising new and advancing technologies, better communications, improved aerial assets, improved training and safety etc... I recognize that there is no magic wand to extinguishing a wildfire, and then to black out a fire ground there is the strenuous detailed work of every log, stump and fox hole being extinguished, there is no way around this.

The single most noticeable detail that I have observed in working with bush firefighting operations is the loss of time, efficiencies and uptime often caused by the tanker assets refilling by current means. This appears to be accepted as status quo, and in many cases sourcing, travelling to/from, and refilling water appears to be a much more substantial part of tanker operations than engagement on an active fireground.

The point I wish to make is that the volunteers accept this as status quo, it's what has always been done, that's part of the job, that's how it rolls, what they are doing is perfectly right and it's what they are trained to do. They are of course doing an amazing job, but in practice it is very inefficient use of assets and human resource.

I could site many examples of this. The most recent being the 2019/20 catastrophic events where there was lack of readily available bulk water in many regions across the state as a result of drought conditions. I have accounts of various category tankers leaving the fireground for refilling and taking hours to return, with the tanker crew accepting this as normal and routine.

We identified a substantial challenge with access to bulk water for the RFS tankers, so thought we should put our collective experience and contacts together, as it was apparent that the sheer scale of the 2019/20 events needed something more.

Long story short is that we established a rapid fill tank and pumping setup that could turn around a Cat 1 tanker in 3 or 4 minutes. Senior RFS personal commented that this provision was without any doubt saving properties and

assets. In this situation the RFS tankers were typically off the fire ground for 20 minutes using the rapid fill v/s 1 to 2 hours for conventional fill methods.

This set up is a transportable bulk tank that is deployed to location empty. It has approx. 70,000ltrs capacity. Once positioned, the tank is filled from mobile bulk tankers. When filled it offers a safe and very rapid water fill facility that is close to the fireground, with the ability to be quickly redeployed to alternative locations. Essentially it quickly became a 'Self-Serve Rapid Fill' water source for the RFS tanker crews.

By way of example. I had been working on bulk water deliveries around Tallong and Wingello leading up to the catastrophic Wingello event on the evening of Sat 4<sup>th</sup> Jan 2020. The Shoalhaven escarpment had been active for several days, it was clear that with substantial pine forest and fuel load between the escarpment and Wingello that Wingello was in a bad position. With the southerly buster predicted for the Saturday evening 4<sup>th</sup> Jan 2020, I spoke to RFS personnel at Wingello RFS and said hey guys, I can donate bulk water assets, when this buster hits, you will need several bulk tanker units located around Wingello, this is going to be bad. The response was that they had a railway tender tank of water located at the Wingello railway siding and that will be ok, we'll get through. My comment was that your bulk water supply will be overwhelmed, furthermore, it's your single bulk water source and if that's impacted by fire it's all over, there will be no hope for Wingello when this southerly comes through, you'll never fill your tankers fast enough, but give me a shout if you need me.

My location at 9.30PM Sat 4<sup>th</sup> Jan was at the end of Caoura Rd on the edge of the escarpment attending to our bulk mobile water tanker – say 15kms south from Wingello. When the southerly came through as predicted within 5 minutes a huge glow from Wingello direction, and a roar like thunder... this was the pine forest, and Wingello was next. Following day, the Wingello RFS requested our 70,000ltr bulk water supply tank with rapid fill pump, which we gladly donated.

Situation was that at the height of the Wingello fire event, the tank in the railway siding was not sufficient, it had a small Honda pump that was 50% functional, tankers were taking an extended time to draft from the railway tanker, there was a trail of tankers of all categories parked along Highlands Way waiting to fill while assets were burning.

During the 2019/20 events I observed several similar occasions where it is the accepted and status quo:

- Travelling extensive distances for tanker refill
- Waiting times at filling points and slow tanker filling rates
- Pumping sludge from half dry dams resulting pumps blocked with mud
- Broken water mains in Katoomba dropping mains supply to a trickle

The result of these challenges is that critical tanker assets are away from active fire grounds for extended periods of time, further stretching what are already insufficient tanker assets as a result of the catastrophic scale of events, also the monetary cost should be a consideration.

To use Wingello as an example, there could have been 3 or 4 of these units positioned around the village, conditions were such that it was highly likely for some time in advance that Wingello would be impacted by fire. I am certain that if bulk water was readily available that assets would have been saved.

I understand the unpredictability and dynamics of bushfire conditions, however, my suggestion is that these rapid deployment fast fill bulk tanks should be deployed to any area that requires assets to be protected that are reasonably likely to be impacted by active fire.

- Rapid fill water readily accessible to fire ground, giving much higher utilisation/efficiency of available tanker assets and crew during an active fire event
- Resulting from above point, the opportunity/possibility to deploy available tanker assets to other areas.
- Low cost deployment, possibly more cost efficient in circumstances where tankers are travelling considerable distance for refill.

- Rapid redeployment. In my experience rapid filling of tankers could easily commence within 30 minutes of positioning the bulk tank.
- Very safe, Tankers not required to access difficult refilling situations.
- Reliable, not completely dependent on town fire mains. (Which seem to be subject to burst during time of high use)
- Relatively low cost, Not required to be permanently manned
- Frees up mobile bulk tankers to transport water to the rapid fill unit and other areas

#### IN SUMMARY:

1. At relatively low cost, these rapid deployment units could be positioned at a number of locations around the state and ready for deployment.
2. At times when infrastructure has a reasonable likelihood of being affected by fire, these units can be quickly deployed to that area, or could be deployed in remote areas where there is active fire at a distance from accessible water.
3. They are easily transported and deployed by a conventional prime mover.
4. If it becomes an active fireground, then all available tanker assets are twice as effective.
5. The rapid deployment tank is 'self-serve' and does not commit already stretched labour resource.

#### OTHER POINTS:

Aside from this I understand that the NSW RFS is a huge organisation that is supported by amazing volunteers who sacrifice their own time and resources at the behest of others. It is an enormous logistical challenge during an extreme fire event to coordinate this. My only further comment is that fire knows no boundaries or LGA's however there often appears to be challenges with communication across these borders. Not something that I am qualified to comment further but does appear to create some challenges.

Happy to discuss at any time

Sincerely

Stan Eagle





