

Cairngorm funicular railway: Written submission from Andrew Hubert von Stauffer, 23 November 2025

Submission to Scottish Parliament Public Audit Committee

Cairngorm Funicular

Background:

My name is Andrew Hubert von Stauffer. I was a ski instructor on Cairngorm 1970-75. I also have skied in Scotland almost every season since then. Having had a wide & varied background in the development of my Skirider invention for adaptive skiers, in addition to professional work in meteorology, journalism, and aviation safety at various levels; I am familiar with how the failure to implement best practice in government seed funding, project development, maintenance and operational issues can and will impact cashflow, capital investment and forward planning.

As a multi award winning inventor & project innovator, I have also had extensive experience of serving alongside various government sponsored agencies & initiatives across the UK & Europe, leading to an understanding of how accountability and audit should work especially in the field of snow sports.

Now in my late 70s I am a widely published author and have been commissioned by The History Press to write: *'Tartan Snow Battle for the Pistes'* due for publication next year, (2026)

With regard to the above title, I have had the opportunity to do considerable research into the background and developing relationship between Cairngorm Mountain (later CMSL) and the village of Aviemore.

Lying at the bedrock of recent history, is understanding that the original foundation of the development, funding and reputation of the Cairngorm expansion project, was bound up with the necessity for a successful Aviemore Centre. The intention was to provide a stable feed for Cairngorm's slopes. This was clear from research into the book written by the disgraced architect John Poulson called *'The Gift'*. It provided many insights into the backroom deals, dubious funding routes and ultimately proven corruption between Poulson and the senior civil servant George Pottinger, that even brought down the former Chancellor of the Exchequer Reginald Maudling. The controversy led to the book being pulped upon publication, for fear of destroying the reputation of several other major politicians and civil servants! Only three copies remain in various receiving libraries.

From this and other contemporary sources, It is evident that the development of uplift on Cairngorm to be the stimulus for an economic winter *'Halo'* effect throughout the Spey valley. There always was an emphasis on promoting a symbiotic relationship between the Aviemore Centre and Cairngorm Mountain with an infrastructure that promoted winter sports in particular. The funicular problems and expense lie at the end of a long road of missed opportunity, poor decision making and management incompetence.

With the change from the old HIDB to the current HIE, the stated aim of Cairngorm being the seed for further development of lift served winter sports was never rescinded.

When it comes to the construction and commissioning of the funicular, there have been specific issues, which from the word go have impacted many aspects of profitability and operating costs. It

had become widely recognised throughout the Spey Valley and the skiing world in general that, through its receipt of public money, developing lift served winter sports in Cairngorm would indeed be stimulating the wider winter economy allowing other businesses to run profitably through the winter season. There has been a general assumption that CMSL would not have an operating profit ever since it divested the shuttle bus service that ran specifically from Aviemore to the base station. Even so, it had been obvious that lift operation, ski patrol, ski hire and catering should offer value for the disbursement of public money, particularly as other ski related startups proliferated, stimulating the local economy.

From the recorded original discussions with both the Conservative, then Labour run central governments in the 1960s and several significant business interests, it is plain that the relationship between Cairngorm & Aviemore should act as a model for the development of other winter sports projects in The Highlands. This was axiomatic to the allocation of funds for the original development of a proven integrated infrastructure for both Cairngorm Mountain and the Aviemore Centre, although one did not use the term '*Mission Statement*' back in the 1960s, this had always been the founding principle.

It's since become obvious that at the planning stage that the uphill lift capacity of the funicular would be significantly less than the chairlift it replaced and it is a matter of ongoing concern that the operating costs have created a situation whereby CMSL, with the tacit endorsement of HIE, found it made more economic sense to dismantle other lifts, such as the Ciste Access and its base station, in order to allow sufficient funding to keep the funicular operational. Sadly, serviceability in the intervening almost quarter of a century, since its commissioning, has been such that you'll find it has not seen as much as one year's worth of full operational capacity.

Plainly for any installation projected to operate effectively for 300+ days in every year, not even to have achieved that number of days' total operation over the past two decades, indicates that something is severely wrong and must be by now little better than a financial black hole. Most of the past winter seasons since its installation have been affected by ongoing unserviceability with a drastic effect on income not just for CMSL but ski school & ski hire operations of the mountain. It is surprising that so far CMSL & HIE have escaped any court action in respect of claims for loss of earnings!

All that said, I cannot honestly say I was particularly critical of the funicular when it was first proposed, but my alarm grew when I realised that best practice was not being followed and that, for instance, no account had been taken of the impact of drifting snow on its operation, particularly when it came to entering the tunnel at the top station.

According to information received, the Railway Inspectorate was originally invited to carry out initial safety inspection & compliance work, but they refused. Another independent inspection concluded that: '...a selective 'cut and paste' from the original recommendations by Doppelmayr (the manufacturer) and some significant directions had not been followed...' One particular example that comes to mind is the fact that splices on the cable which should have been capped with white metal. Instead, these were braided with ends secured by bulldog grips. The reliability of this arrangement had been untested and not recommended.

It is certainly true that Doppelmayr recommended steel supports for the funicular railway track, in common with other installations in the Alps, but that in its place concrete had been suggested then substituted as a cheaper option. From bitter experience with airfield runways, there is no practical solution to the use of concrete in persistent freezing conditions, despite specific mixes being developed to cope with ground frosts. Others, who have more expertise in this area, insist that reinforced concrete is the last thing anyone should use as an unsupported structural building material when there is a risk of air temperatures dropping below -2C before the concrete is properly set.

As a onetime UK Met Office trained meteorologist, I can affirm that in climate terms, Cairngorm is still classed as sub arctic and that intense freezing conditions will occur at any time of the year. There is also a question of anchoring poured concrete in the substrate. The geomorphology of Cairngorm is both complex and problematic as water percolation and freezing occurs at a variety of depths over the whole mountain. Others would be able to confirm this based on their qualified expertise.

All of the above has particular impact on both stability and serviceability with serious implications for maintenance and running costs. There are also very serious concerns about public safety. I realise this is anecdotal, but it can be confirmed that a Swiss ski lift engineer who visited Cairngorm stated that he felt the funicular to be so unsafe, that he would not care to travel in it.

One of the costliest items for any uplift in a mountain environment is maintenance to an acceptable standard. Maintenance should be predicated upon a well researched handbook be it in physical form or on a computer. I was told that there was no comprehensive maintenance manual that had been either inspected or certified by any national authority to accepted standards. It was as if CMSL was marking its own homework!. This is very worrying and undesirable.

I realise that as an audit committee your specific interest is on whether public money has been well spent. My contention is that this failure to have any nationally let alone internationally agreed maintenance standard inevitably reads to unserviceability and unnecessary expense. It is obvious that both CMSL & HIE are well aware of the shortcomings and are basically spending more time and money in ad hoc maintenance, catching up with faults as they occur in the hopes of intervening before they developed to a point of being dangerous. Plainly that impacts expenditure and the awarding of contracts based upon available funds and who is making the lowest quote, rather than proven expertise!

It is fair to say that there are few companies in the UK who have any expertise in providing uplift for skiers and snowboarders in a mountain environment, particularly at a location which consistently records the lowest temperatures in the United Kingdom. Plainly it would have made more sense for installation, maintenance and a training regime to be agreed with those companies in Europe and Scandinavia who understand the problems and who were in a position to offer significant advice at the construction stage.

Regrettably we have a culture in this country where the priority of budgetary restrictions impact operation and safety, rather than the other way round. It has been argued elsewhere that a funicular was very ill advised in the first place and would prove to be an expensive option in terms of construction, maintenance and operation.

With specific regard to operation, unlike a chairlift, the clearance of snowdrifts, de-icing & preparation after a blizzard and ongoing freezing weather is more labour intensive than chairlift pylons and cables, because there is a track to be inspected which provides a continuous barrier impacting the depth of drifting snow with largely unknown consequences. This necessitates a great deal of man hours spent in making sure that in what is a dynamic meteorological situation, the funicular can continue to operate.

I was told by many different sources that a revolving door for management existed between HIE & CMSL with the same staff responsible for management failings in both organisations and furthermore, contracts were not awarded competitively, based on a combination of performance and value for money, but on personal acquaintance and that wage and benefit packages were out of control. Others have suggested that work on the funicular was not being done consistently with consultancy fees paid for little result.

I have no means of proving this but given that the same story was repeated several times, then it must be of interest when it comes to misspent funds. It was as if the funicular technical woes were being used as an excuse for what has unfortunately amounted to a gravy train.

Based on the above I would suggest that a proper audit would soon uncover the truth. This is way beyond my own competence and experience, but the plain effects of lingering unserviceability, missed opportunities on suitable skiing days and the inaccessibility of the snowsure Ptarmigan area, with its effect on day ticket sales and catering income at the restaurant, do speak for themselves.

There is an unwillingness to accept that wildlife will often adapt to, and exploit opportunities provided by mankind's activities, especially with snowmaking allowing adaptive fauna such as Mountain Hare & Ptarmigan to exploit their winter coats. Arguments based on what would appear to be ill researched environmental concerns, have been among the reasons for opportunities to allow uplift development of Coire na Ciste & Lurcher's Gulley to be abandoned. This effectively cut off any chance of future income streams not just for CMSL but the wider community.

More recently arguments about climate change have been allowed to hinder winter sports development, with counter suggestions of mountain biking and Karting being the salvation of the funicular, despite the obvious damage to vegetation, risk of further erosion and impact on the funicular infrastructure. It's as if CMSL & HIE are wanting to build further problems into an already fraught situation.

These pressures, among other controversies, all help to foster a lack of purpose and accountability when it comes not only to the serviceability & deployment of the funicular, but CMSL & HIE management of government funded resources.

In summary, I feel that is in the interest of the audit committee to look at these wider issues and investigate exactly what the impact of meteorology, morphology, maintenance, mismanagement, poor contract oversight, lack of expertise and operation had on the allocation and consumption of key funding across the board for CMSL. It may also be wise to consider future impact on all winter sports projects.

The financial demands of the funicular make the current position of CMSL & HIE untenable. The sad catalogue of events on Cairngorm already has received a great deal of adverse publicity from the

wider snow sports industry and judging by the tens of thousands of enquiries about my forthcoming title from around the world, the outcome of any enquiry will further impact the reputation of not only HIE & CMSL but the perception of both project management and Scottish Government. competence internationally.

Dated November 23, 2025

Andrew Hubert von Staufer