

FERRY INDUSTRY ADVISORY GROUP MEETING MINUTES – 8 AUGUST 2019

Attendees

Allan Comrie (AC)
Michael Craigie (MC) – by phone
Paul Flynn (PF)
Brian Fulton (BF)
Kevin Hobbs (KH)
Ranald Robertson (RR)
Roy Pedersen (RP)
Richard Hadfield (RH) Chair
Alison Wills (AW) Minutes

Apologies

Alf Baird (AB)
Ian Docherty (ID)
Brian Gordon (BG)
Gordon Ross (GR)
Chris Wilcock (CW)

1. Introductions

RH welcomed the attendees and explained that CW was unable to attend in person due to other business which had arisen and sent his apologies.

2. Minutes of Previous meeting

It was noted that the Minutes had been circulated round the group for comment and had subsequently been published on the Transport Scotland website.

3. General Update

A general update was provided since the previous meeting on 4 April;

The Northlink Ferries tendering exercise had been concluded. Pentland Ferries had made a complaint to the European Commission and a decision was awaited. Final legal issues were being resolved before the announcement of the winning bidder could be made.

Fergusons shipyard had been in the news recently regarding the two hulls being built at this yard. The Scottish Government remains committed to the delivery of vessels, the yard and the employment it provides and is working intensively with yard owners to make progress.

Work on the next CMAL vessel was progressing and design consultants about to be appointed. Positive feedback had been received with regard to the Scottish Government having taken advice from the Ferry Industry Advisory Group regarding aspects of the vessel design.

A consultation on the new draft National Transport Strategy (NTS) for Scotland had been opened on 31 July to help determine whether the Strategy's Vision, Priorities and Outcomes are the right ones for our transport network for the next twenty years.

The National Islands Plan consultation is ongoing and will be key to how we will all work together with island communities in the future. Many island visits had been undertaken and good quality feedback received, which would be used alongside the next Strategic Project Review which is underway and is looking at investment options to achieve delivery under the Strategic Transport Projects Review (STPR).

Concerns were raised from a member of the group requesting passengers, trade and freight were all given equal consideration as part of the Review, and this feedback was noted and could be included in consultation responses.

Regional Transport Strategies are also being developed for ministerial approval. These will sit between the National Transport Strategy and Local Transport Strategies from Local Authorities. It was noted that passengers' journeys could be shared between different operators, some of which would not have ownership of the fares scheme being applied but who would be responsible for delivering this.

4. The Future Shape of Transport

Two papers had been circulated to assist and inform conversation and comments received. Discussion of the possible discussion points in the papers followed:

The National Transport Strategy draft for consultation

- Vision:
- *“We will have a sustainable, inclusive and accessible transport system, helping deliver a healthier, fairer and more prosperous Scotland for communities, business and visitors.”*
- 4 Priorities, each with 3 associated Outcomes:
 - Promotes equality
 - Takes climate action
 - Helps our economy prosper
 - Improves our health and well-being
- Challenges:
 - *“many people encounter problems when trying to access the services they need”*
 - Businesses face congestion and delays
 - Greenhouse gas and air pollution.
- 14 policies supported by 38 enablers.

The group discussed views that each island should be looked independently with a view to assess their differing needs, taking into consideration changes that have happened in island populations including demographic shift, tourism, second home ownership, island businesses and other factors. Since ferry services were introduced decades ago in line with island requirements at that time they may not be appropriate now.

Other solutions such as bridges or tunnels, as well as new technologies such as those regarding emissions, should also be taken into consideration. The Islands Act prevents disproportionate expenditure on any one island.

Ferry services should be as efficient as possible, balancing requirements. Ferry crews living locally on islands could be part of sustainable crewing models for future delivery, depending on vessel location, housing availability and timetables. A local community planning approach could be used to take various factors into consideration, which could tie into Regional or National plans, although this could prove difficult. It was suggested that a presentation by MC may be helpful as an example of community planning for other communities to benefit from.

Technological advances

- *“Innovation coupled with improvements in technologies are fundamentally changing the provision of services and bringing opportunities that couldn’t be imagined only a few years ago”.*
- Connected and autonomous vehicles (CAV):
 - Some small scale autonomous ferry trials for freight and passengers
- Mobility as a Service (MaaS):

“Improvements in digital travel data provision and ways we access our transport via digital platforms are influencing growth in mobility as a service”

- MaaS Investment Fund (£2 million) focused on easy digital access to information and services
- Technology is also leading to behavioural change: working from home, shopping deliveries; declining car use in some groups.

MaaS technologies are progressing, with ticketing solutions underway. It was noted that passengers on various forms of public transport can use ‘contactless’ payment via bank/credit cards or phones to pay for travel, even across differing types of public transport, to reach their destination.

Multi tickets bought in advance however could be better value than single purchases. Using a smartcard on which to download a ticket/multiple tickets could provide the maximum discounted travel rate. These forms of ticketing were not currently available for vehicles, private or commercial, however this could be considered in future.

Routes with Road Equivalent Travel (RET) charge a standard fare for a journey, no matter how far in advance tickets are booked, the payment method used, or the number of tickets booked. When RET is evaluated inclusion of discounts for reasons such as these could be given consideration, as could a flat fare regardless of distance to overcome barriers including those faced by those on low incomes.

Emissions

- 37% of Scotland’s GHG emissions are accounted for by transport
- Of these, 15% are from shipping (including ferries) i.e. c.5.5% of the total; aviation is similar
- Known zero/low carbon technological opportunities: electric battery and hydrogen

Manufacturers are commercially refining hydrogen fuel cells capable of powering ferries, however this is not a viable option as yet. It was noted that hydrogen fuels do not have the same dead weight issues which batteries have.

Electric powered ferries using green technology were discussed. The weight of the batteries required to provide sufficient power to fully run a ferry would mean a reduction in the number of vehicles carried due to the weight of the batteries themselves.

Wind and or tidal steam turbines on islands have the potential to charge electric ferry batteries and/or generate hydrogen by utilising generation peaks to electrolyse water using green energy, although additional turbines may be required on those islands which do not currently have any, and charging points at ports would need to be increased providing there is sufficient energy available, from the national grid if required. There was no information available to indicate if the amount of power required to charge ferries would remain high or would decrease in future with advances in technology.

Details of the Ampere, an electric ferry in Norway, were provided. This ferry runs on lithium-ion batteries which are charged at both ferry terminals each time a crossing is made, and further trickle charged overnight. A considerable amount of power is required however, and the batteries need to be regularly replaced, at a cost of £10m last year.

Battery powered ferries can trickle charge overnight but topping the power levels up during the day is not the preferred option.

It was noted that electric ferries have instant power, which is helpful when manoeuvring in port, as confirmed by crew on the Loch Seaforth, which is powered by a combination of diesel fuel and electric motors.

There were concerns about the ethics of mining with regard to the use of cobalt in lithium-ion batteries and it was noted that manufacturers advise there is a risk of fire with batteries.

The design of ferries, monohull and catamaran, were discussed by those present and compared. Papers by AB and RP had been previously circulated. Further details, reflective of this discussion can be found at Annex A. It was noted that not all group members had been present at this discussion and the outcomes are therefore not unanimous.

It was agreed that, taking the above into account, it would not be possible to replace all of the existing ferries with catamarans per the suggestion in one of the papers. It was agreed that whilst there was some merit in consideration of catamarans for some routes, the Group did not feel that they were suitable for all routes.

5. AOB

No other business was raised.

6. Date of Next Meeting

The next meeting was arranged for 17 October in Buchanan House Glasgow at 1100hrs.

The group met on 8 August 2019 to discuss the future of transport within the context of the Scottish Government's draft National Transport Strategy, and how this relates to ferry services. This discussion covered a range of topics, including catamarans.

The discussion at the Advisory Group on the use of catamarans compared with mono-hull vessels enabled the group members to set out their views and for those views to be analysed and challenged by each other and by the Transport Scotland chair in a constructive fashion.

Discussion revealed that there are differing views on the benefits, challenges and practicalities posed by introducing catamarans into the lifeline networks. No consensus view emerged. The main points captured from the discussion were as follows:

- Construction costs, on a like-for-like basis i.e. if produced in the same shipyard, were approximately the same, although catamarans were slightly cheaper to build due to the lightweight hulls having less draft and being made with a higher aluminium content to decrease weight;
- A typical catamaran, because of its wider beam, would not be able to fit at many current CHFS ports but at the design stage of a newbuild, the vehicle ramps of a catamaran could be designed to be offset, as has been the case on occasions with some existing CalMac vessels;
- Operating costs, on a like-for-like basis, would favour catamarans in terms of their markedly reduced fuel requirement. Crew numbers are determined by a number of factors and it was acknowledged that catamarans did not have an inherent advantage over monohulls in this respect.
- Experience within Scotland was currently limited to the MV Pentalina, whose performance was recognised though a comment was made, based on observation, about her condition and longevity, and the MV AliCat. Previous experience on services to Ireland was cited but it was clarified that these were largely using high speed craft, not favoured or proposed for Scottish routes, which were withdrawn when fuel costs escalated.
- Passenger discomfort including seasickness tends to be more prevalent on catamarans than on monohulls other than when seas are relatively flat and calm.
- Clearly catamarans are a successful option in certain locations and in certain routes but there is no evidence from vessel investments by commercial ferry operators in northern Europe that they are the right solution for all circumstances.
- The general view was that catamarans would not be suitable for long, exposed routes such as those across the Minch and would be more suited to short and relatively sheltered routes such as Oban-Craignure. However, the disadvantages of having route-specific vessels which could not then provide cover for e.g. Colonsay, Coll and Tiree was noted, though some members were more

positive than others of the potential for catamarans on a wider range of CalMac routes.

- It was agreed that, taking the above into account, it would not be possible to replace ALL of the existing ferries with catamarans as per the suggestion in the STS paper. It was agreed that whilst there was merit in consideration of catamarans for some routes, the Group did not conclude that they were suitable for all routes or the solution for the whole Scottish ferries network.

Further work would be required to determine if catamarans would be suitable and reliable to operate on the CHFS or NIFS networks and, if so, which routes and how that would be integrated into a network-wide strategy for vessel replacement.