Editorial

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On behalf of the editorial panel I welcome you to the December edition of *Transport*. This month we bring you a group of papers which describe familiar challenges to readers of this journal in the development of a transport project, or in the operational life of a transport asset. That is, to balance the often-conflicting demands of the level of service provided, the cost of providing that service and the risk. This is a classic asset management paradigm. The reader will also appreciate that the promoter, funder, owner, operator, maintainer, user and neighbour have different perspectives on every transport asset. Human behaviour, too, has a significant role in the choices made during the development and operational stages.

As transport assets age, and variations in user capability, expectations, environmental issues and funding levels take place, it is important to review our original or previous assumptions and implement changes to reflect the predicted operational performance in the current context. Our papers in this edition examine decision-making factors which have an impact on the choice of the asset or its operation.

In our first paper, Elyasi *et al.* (2018) consider the risk factors for road traffic collisions in Iran; they identify that human factors, particularly age and education, were the most dominant factor. It was concluded that young driver training would provide the best-value improvement over the long term.

Bassan (2018) considers the safe operation of two-lane inter-urban highways in Israel, as part of that country's new geometric design policy. Driving behaviour on this type of road leads to higher rates of injury and fatal accidents than on other types of road. The use of passing lanes and divided carriageways by 'soft' and 'hard' separation measures were seen to improve safety performance in sections which have had historical traffic collisions.

The nature of urban traffic composition and its interactions in developing countries is significantly different to the models assumed in developed countries. Sasikumar and Rajamma (2018) look at the interactions between vehicles in India to determine the passenger car unit (PCU) for urban arterial roads, where the relatively different rates of acceleration and

deceleration of two- and three-wheeled vehicles, buses and cars reduce their capacity.

The operational interaction between transport infrastructure and people is examined by Sun *et al.* (2018), who consider the impact of geometry on pedestrian flow within Beijing's subway system and report that the angle of change is the most significant factor in the disruption of flow. Where a directional change is 90° as commonly found on Beijing's and many other subway systems, the density and speed of flow are mainly influenced by the radius of the turn and the volume of flow. Operational improvements have been proposed to mitigate and improve flows.

Human behaviour is one element in the journey-making choice process. Economic reasons are another. In our fifth paper, Dong *et al.* (2018) examine the preferences of intercity business travellers between car, intercity bus and high-speed train in the Yangtze River Delta area of China through attitudinal surveys and find that convenience and reliability are the two most important factors. The paper aims to provide data to support marketing strategies for intercity transport choice.

The last paper in the edition, by Yu *et al.* (2018), is a pure economic evaluation of transport infrastructure for the Hangyong canal which serves the port of Ningbo, the third largest container-handling port in China. The port is mainly served by road traffic and the inland waterway aims to compete for freight transport against other methods. The paper finds that modal share can be increased by increasing the channel capacity. Other benefits of increased canal modal share are forecast to be reduced road congestion, reduced vehicle emissions and better energy availability.

On behalf of the editorial panel I hope you enjoy this edition and we wish you a happy Christmas and a prosperous 2019.

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