

Rail Delivery Group



National Rail

Putting the 'Smart' in Smart Ticketing:

Developing Insight from Barcode Scan Data



Past

Establishing Smart Ticketing



Present

Developing Barcode Insight



Future

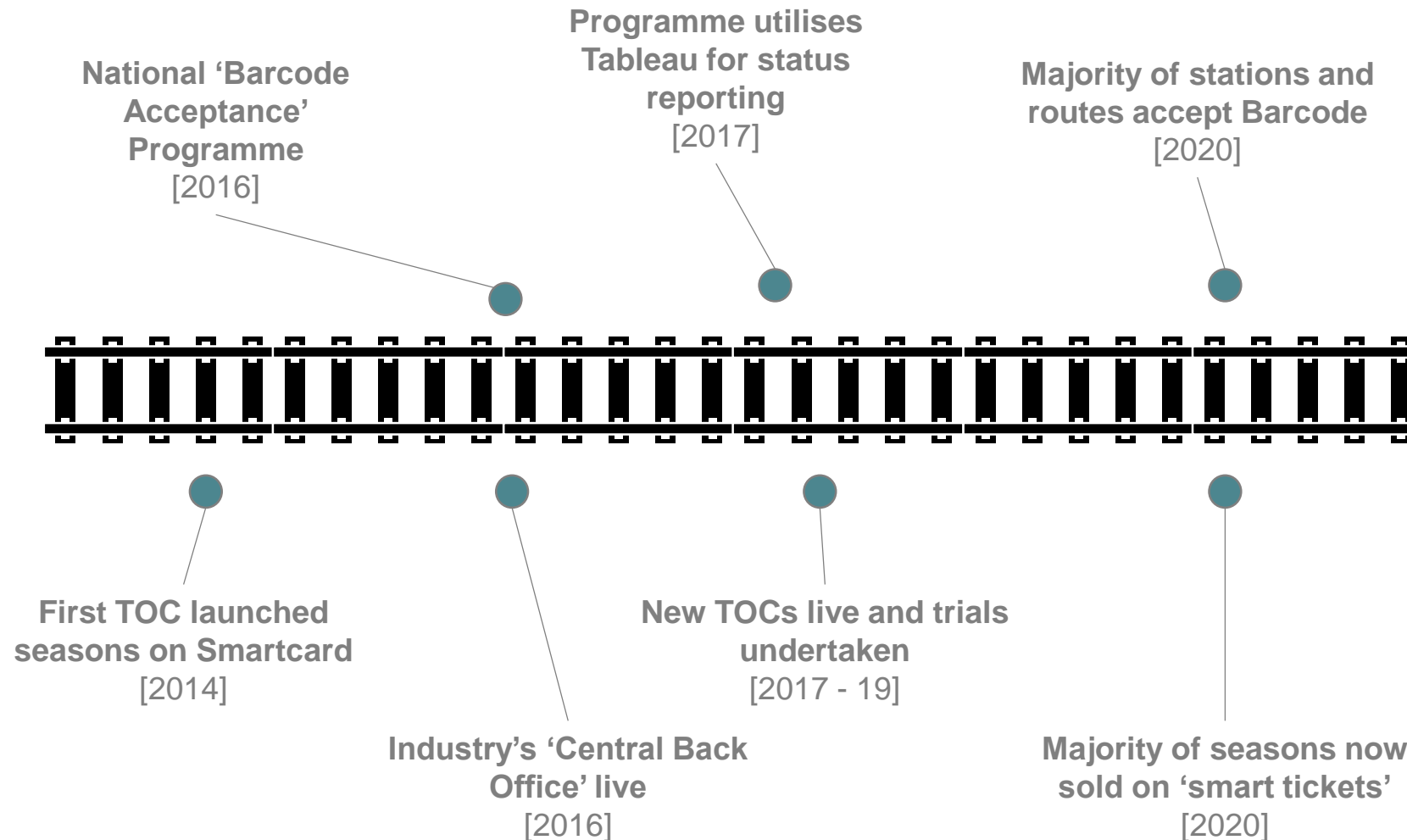
Next Steps on the 'Data Driven' Journey



1.

Establishing Smart Ticketing

History of Smart Ticketing



Benefits of Smart Tickets



**Enhanced
personalisation**



**Saves time and
stress**



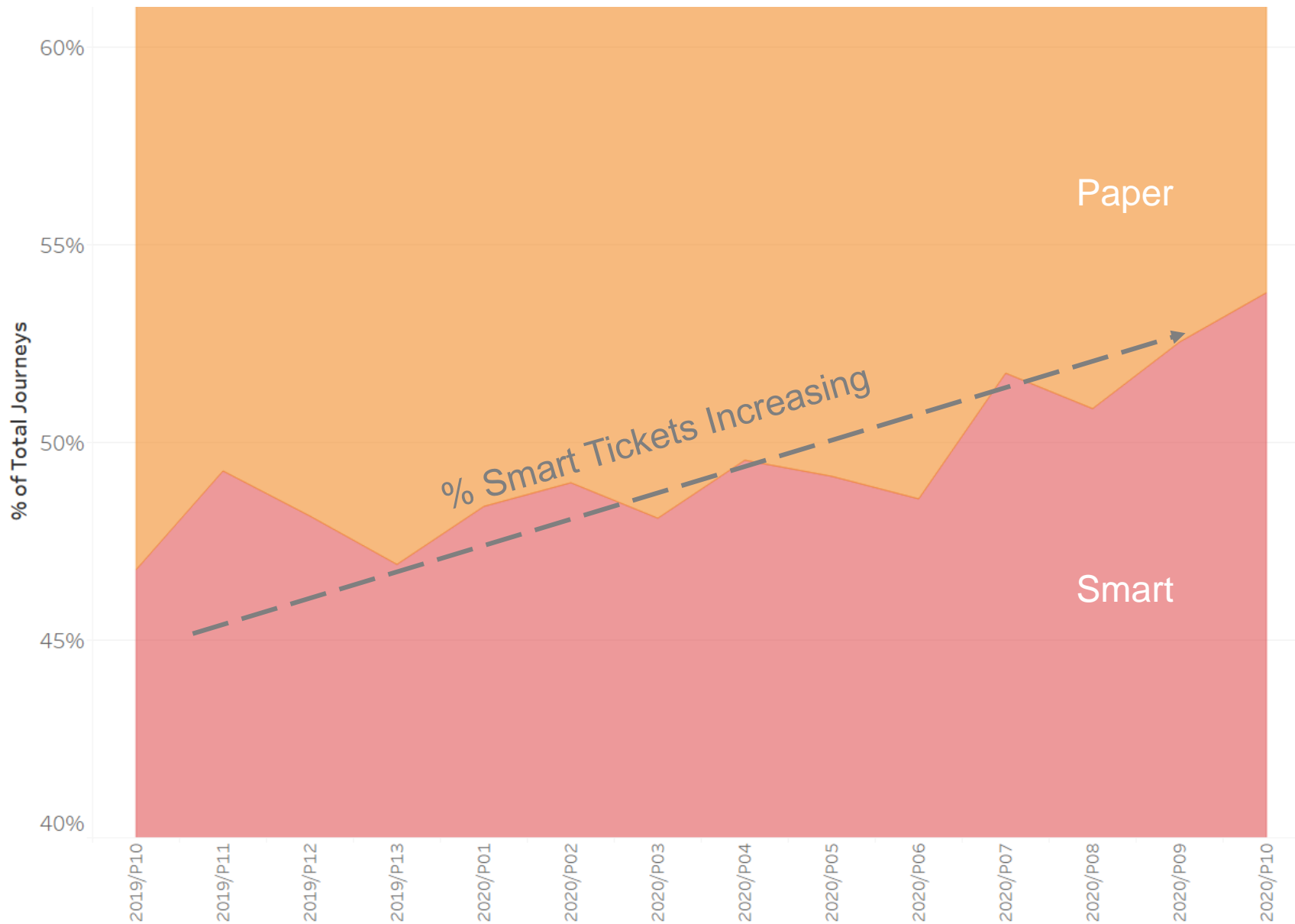
**Improved fraud
detection**



**Provides richer
data**

Current 'Take Up' of Smart Tickets

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Smart Week



156 Events through the week



Increase in awareness



Additional 1.5m journeys made



Positive public response for campaign





2.

Developing Barcode Insight

Localised analysis undertaken



Data shared for operational purposes

- Data is held in each TOC electronic ticket validation database (eTVD)



Operators specific analysis

- Varying abilities and insight for each operator



Complementary data sets held by RDG

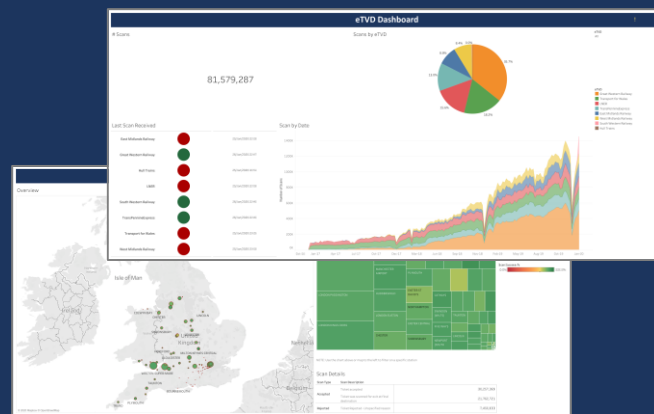
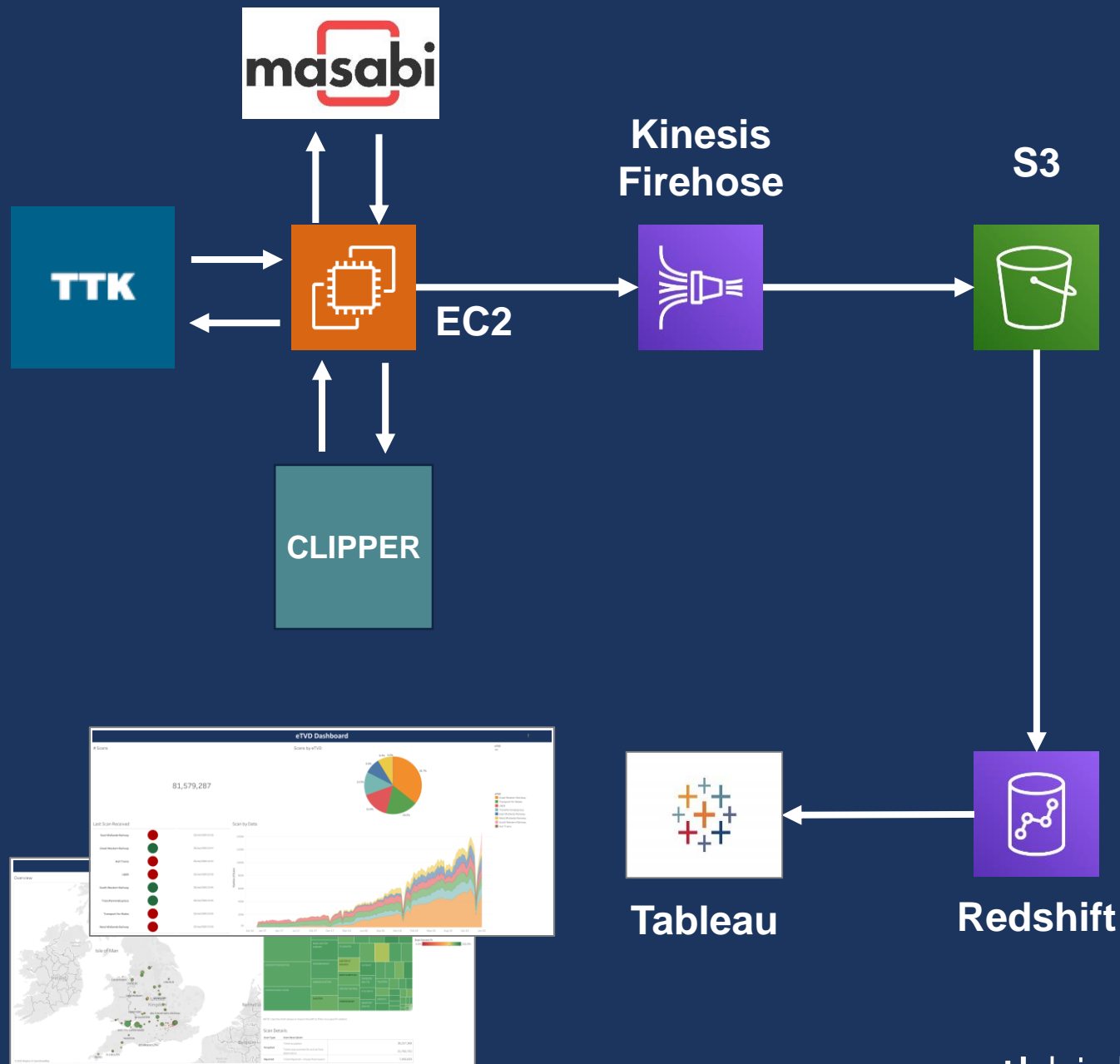
- Ability to link to Industry-wide Sales, Performance and Satisfaction data

Previously

Developing shared insight

Now Live

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Local Barcode Server Capacity

!

LBS Capacity - Volume Scans per Minute

Station Name

Device Id

eTVD

- ☐ East Midlands Railw
- ☒ Great Western Railw
- ☐ Hull Trains
- ☐ LNER
- ☐ South Western Railw..
- ☐ TransPennineExpress
- ☐ Transport for Wales
- ☐ West Midlands Railw..

Days to show...

7

Select the # days to go back
(max: 28)

LBS Capacity Indicator

- ☐ Acceptable
- ☐ Attention
- ☐ Warning

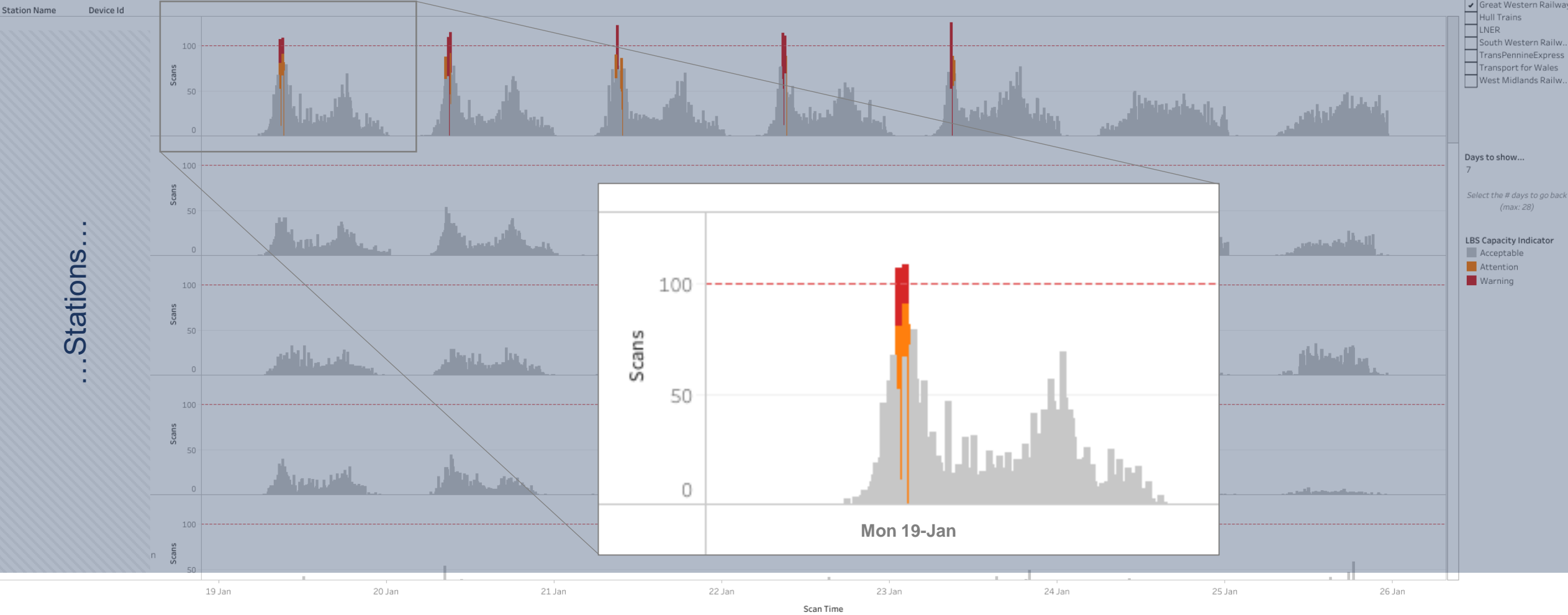
Local Barcode Server Capacity

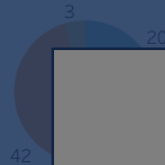
Identify stations which might require infrastructure upgrades to improve customer experience

Local Barcode Server Capacity



LBS Capacity - Volume Scans per Minute



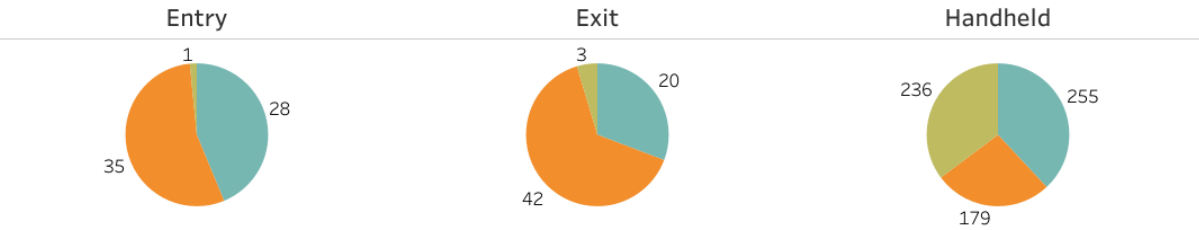


Identify tickets that have suspicious usage patterns to tackle potential fraud

Suspicious Activity - Singles



Scan Location



Gateline Scans



Ticket Scans

Utn	Day of Last Seen	Days Seen	Scans		TOC
TTDKYNEDY6C	2020-Jan-20	49	231	<div><div></div><div></div><div></div></div>	TransPennineExpress
A0611024190	2017-Nov-13	26	71	<div><div></div></div>	
A0611024340	2018-May-01	32	60	<div><div></div></div>	
TTE5PLC57RH	2019-Dec-22	13	19	<div><div></div></div>	
TTDQPJCVXZN	2019-Jun-25	13	17	<div><div></div></div>	
TTFL2WSZ35B	2019-Sep-17	7	16	<div><div></div></div>	
A0614576950	2017-Nov-01	7	13	<div><div></div></div>	
TTEK4ZG4Y8Z	2019-Jan-15	4	13	<div><div></div></div>	
A0614744970	2017-Oct-04	3	8	<div><div></div></div>	
TTEWX3J2R37	2020-Jan-16	5	7	<div><div></div></div>	
TTFFDKCK9BG	2019-Jun-24	4	8	<div><div></div></div>	
A0628867150	2019-Oct-21	3	6	<div><div></div></div>	
A0628188090	2019-Sep-19	3	6	<div><div></div></div>	
A0628495470	2019-Oct-03	3	6	<div><div></div></div>	
A0628473810	2019-Nov-07	3	4	<div><div></div></div>	
A0628909640	2019-Oct-17	3	5	<div><div></div></div>	

Filter by Date Last Seen...

Suspicious Activity - Singles



Scan Location



Gateline Scans



Ticket Scans

Utn	Day of Last Seen	Days Seen	Scans		Utn
TTDKYNEDY6C	2020-Jan-20	49	231	<div></div>	All
A0611024190	2017-Nov-13	26	71	<div></div>	eTVD
A0611024340	2018-May-01	32	60	<div></div>	Great Western Railw..
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Filter by Date Last Seen...



Putting the pieces together

*Linking tickets sold with tickets scanned
to inform revenue protection*

An aerial photograph of a wide, winding river flowing through a deep mountain valley. The river has several large, meandering loops. The surrounding mountains are rugged and covered in sparse vegetation. The sky is filled with soft, white clouds. A teal-colored graphic element, consisting of two overlapping squares, is positioned on the left side of the image.

3.

**Next Steps on our
'Data Driven' Journey**

Where do we go from here?

“

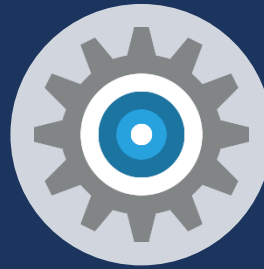
There needs to be a much stronger focus on passengers. This has been common ground from everyone we have spoken with. Passengers must be at the heart of the future of the railway. (Keith Williams)

”

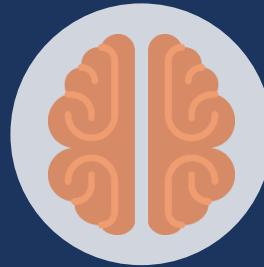
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Enhanced Personalisation



Operational Improvements



Industry Disruption



Inform Fares Reform

northhighland
WORLDWIDE CONSULTING



David Sagar



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david.sagar@northhighland.com



rdg.smart.ticketing@raildeliverygroup.com

A photograph of the interior of Grand Central Terminal, showing the iconic vaulted glass and steel ceiling and the busy concourse with many people walking. The image is dimmed to serve as a background for the text.

Thank you.

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