



Hertfordshire County Council Permit Scheme Evaluation - Year 6

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1-Executive Summary

Year 6 of HCCs Permit Scheme has been a good year, delivering a lot of benefits as detailed in the remainder of this report and delivering the majority of our key actions from year 6. We are pleased to report that we are fully compliant with the recommendations of the DfT Permit Scheme Evaluation Report.

Also new this year, we have undertaken a “text analysis” project which is already demonstrating how the application of conditions helps reduce the impact of road and street works and we hope this can be used to provide further supporting evidence for things such as permit fee discounts and collaborative working. Although there has been an improvement in collaborative working, we still want to see further collaboration between works promoters especially as Hertfordshire enters a period of huge growth.

We welcome the Street Manager project and look forward to the benefits this will bring, in particular the ability of street manager to react in real time and the potential reduction of the administrative burden that the operation of Permit Schemes entails. Some of our actions this year have attempted to reduce this burden but with mixed results and it is disappointing that some Works Promoters seem to want to deliver their works in a manner that disregards the administrative costs.

We continue to embrace the use of new technology such as the “smart cone” and continue to strive towards real-time information about road and street works being readily available.

Looking ahead, we may consider introducing a Lane Rental scheme to compliment the Permit Scheme. It will give additional benefits, and reduce the impact of works, on the busiest parts of our highway network.

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December 2018

2-Evaluation Overview and Methodology

The Performance Measurement and Management of the Permit Scheme underwent a significant review during year 5 of the scheme operation and therefore no major changes were made during year 6. Some additional “custom” measures have been added to support specific actions and the capability to analyse text strings for conditions and response codes – along with the economic impact of works – has given the Authority a new set of performance reports, examples of which are in section 8.

3-Action Plan for Year 6 - Results

The actions below were the focus of the Permit Scheme Performance Framework during year 6 (Nov-17 to Oct-18). The outcomes of these are noted below

No.	ACTION	LINK TO PERMIT SCHEME MEASURE
1	<p>Complete an updated Cost Benefit Analysis (regulatory requirement)</p> <p>Outcome – CBA for years 1 to 3 included in section 6 and seen as still current and relevant for years 4 to 6 COMPLETE</p>	N/A
2	<p>Provide a detailed income/costs statement (regulatory requirement)</p> <p>Outcome – refer to section 5. COMPLETE</p>	N/A
3	<p>Review the discounts available to permit fees to determine if they are fit for purpose and help to deliver the Permit Scheme Benefits & Objectives and adding additional discounts where appropriate, that will drive behaviour change. This may be subject to consultation and/or variation of the Scheme.</p> <p>Outcome – review complete and new discount for where multiple permits are submitted as part of a wider project has been added to a new version (3.0) of the Authority Addendum. We will continue to review this subject and consider what other discounts are offered by other Permit Schemes. COMPLETE</p>	N/A
4	<p>Ensure any relevant recommendations from the DfT Permit Scheme Review Report are incorporated into the scheme operation and performance measurement framework.</p> <p>Outcome – review complete, HCC are fully compliant with all recommendations. COMPLETE</p>	N/A
5	<p>HCC wish to apply a monetary cost to the economy of the impact of street and road works. This is required by works type, street type, works duration and traffic management type. The only figure available in the industry is a flat rate £'s per day which is of little use. This requirement will be incorporated into the engagement with a third-party organisation (Open Road Associates).</p> <p>The outputs can be used to measure and demonstrate the positive benefit of coordination actions within the Permit Scheme e.g. the application of conditions, hours and times of working, changes to traffic management.</p> <p>Outcome - The capability to analyse text strings for conditions and responses provides a powerful tool to enable the measurement and effect – economic or otherwise – of the application of conditions. In particular, the added value that the coordination team provide that a permit scheme allows, as opposed to operating under a noticing regime. The charts in section 8 provide some examples of this and this capability will be consolidated during year 7. COMPLETE</p>	N/A

No.	ACTION	LINK TO PERMIT SCHEME MEASURE
6	<p>PAA Lead Time – continue to resolve the issue of late submission of PAA Applications of certain Highways Works types</p> <p>Outcome – specific actions have been included in this year’s annual plan to help resolve this issue. This will be incorporated into “business as usual”. COMPLETE</p>	PSPI-2
7	<p>Unnecessary or Missing Condition (RC11) – the application of RC11 to permit applications is considerable (32,3% of all RC codes used). Work will be undertaken to identify the promoters and/or contractors most at fault and to set improvement plans with the aim of reducing unnecessary administration.</p> <p>Outcome – we will continue to monitor this issue, and this will be supported by the capability of text analysis. Further detail of specific promoters and/or contractors to be produced. A target of 10% of all RC codes issued is aimed for. Year 6 data is displayed at page 21 CARRIED FORWARD TO YEAR 7</p>	PSPI-5a
8	<p>Variations – The overall trend of increasing volumes of variations will be investigated to identify any opportunities to reduce these volumes, including a focus on promoting a “right first time” policy.</p> <p>Outcome - when responses to Modification Requests are excluded, volumes are at an acceptable level COMPLETE</p>	PSPI-7
9	<p>HCC recognise that the correct application and use of conditions is the biggest single contributor to delivering benefits from the operation of a permit scheme. In year 5, we have introduced a process that captures the NCT codes within the condition text field of EToN. The next stage is to introduce the ability to analyse the free text data with a view to capturing the benefits from applied conditions e.g. moving works from TS to Non-TS times, working hours. This requirement will be incorporated into the engagement with a third-party organisation (Open Road Associates).</p> <p>Outcome - The capability to analyse text strings for conditions and responses provides a powerful tool to enable the measurement and effect – economic or otherwise – of the application of conditions. In particular, the added value that the coordination team provide that a permit scheme allows, as opposed to operating under a noticing regime. The charts in section 8 provide some examples of this and this capability will be consolidated during year 7. COMPLETE</p>	PSPI-8
10	<p>Cancelled Road Space – continue to issue volumes, days planned occupation not used and monetary value of permits cancelled after grant to Statutory Undertakers and Highways Works promoters.</p> <p>Outcome – although there has been a decrease in the volume of works cancelled after grant, there still remains a substantial value of wasted money on permit fees for granted works that are subsequently cancelled. Data has been repeatedly shared at quarterly co-ordination meetings. There is no further action the Authority can take. Year 6 data is displayed at pages 28 and 29 COMPLETE</p>	PSPI-10

No.	ACTION	LINK TO PERMIT SCHEME MEASURE
11	<p>Works Durations - work will commence to identify average duration for works, considering the works type, promoter and text analysis of the works description and the coordination teams will use this information when considering permit applications (text analysis of job works description is also part of the engagement with Open Road Associates).</p> <p>Outcome - Where possible to measure, works durations are broadly in line with AHUC guidelines. Issues remain where there is need to identify measurements as well as the activity. If the works description text analysis within the ORA project supports this then this will be incorporated into this action. Monthly performance reporting needs to include a measure/report to show actual works durations measured against AHUC guidelines. CARRIED FORWARD TO YEAR 7</p>	PSPI-13
12	<p>Late submission of Works Extensions Requests – during the second half of year 5, the issue was raised with all works promoters. If there is no significant improvement in the first quarter of year 6, improvement notices will be issued where required and more direct action taken if found to be appropriate.</p> <p>Outcome - despite several meetings with relevant Statutory Undertakers, there has been no significant reduction in the percentage of late submission of duration requests. Statutory Undertakers were advised that as from 1st November 2018 (start of year 7), the Network Management Operation Team will be refusing all duration extension requests, on planned works, that are submitted late. Monitoring will continue in year 7. Year 6 data is displayed at page 30 CARRIED FORWARD TO YEAR 7</p>	PSPI-11
13	<p>Works Data Variations Immediate Works - The HAUC Guidance for the Operation of Permit Schemes states that there is no requirement to respond to AIVs on Immediate works unless there is an issue. Some promoters have embraced this, greatly reducing unnecessary administration, however other promoters are still submitting high volumes of WDV in response to AIVs on immediate permits. Work will be undertaken with all works promoters, to address this unnecessary administrative burden on both parties.</p> <p>Outcome - despite repeatedly raising this issue at quarterly co-ordination meetings, there has been no real reduction in responses to AIVs on immediate works from certain Statutory Undertakers. No further action can be taken. Year 6 data is at page 33 and also includes an indicative value of the time spent by Statutory Undertakers by unnecessarily responding to AIVs on immediate works COMPLETE</p>	PSPI-12
14	<p>Permit Compliance Inspections - plans are being formulated to increase the number of NRSWA and Permit inspections for HCC Framework sites from April 2018.</p> <p>Outcome – we continue to work towards delivering this action, but this will need to be carried over to year 7 because of contractual issues with HCC Framework Contracts. However, the audit inspections that are carried out on these works will become consistent with NRSWA and Permit Compliance Inspections. CARRIED FORWARD TO YEAR 7</p>	PSPI-16

4 Action Plan for Year 7

The actions carried over from year 6 are listed below. Apart from these, we look forward to seeing how the introduction of Street Manager will support the reduction of the administrative burden that some EToN processes currently carry. In the longer term, the real-time monitoring and management of the network provided by Street Manager, will provide opportunities to further streamline our processes. Which, in turn, will enable improved real-time information available to the travelling public.

No.	ACTION	LINK TO PERMIT SCHEME MEASURE
1	<p>Unnecessary or Missing Condition (RC11) – the application of RC11 to permit applications is considerable (32,3% of all RC codes used). Work will be undertaken to identify the promoters and/or contractors most at fault and to set improvement plans with the aim of reducing unnecessary administration.</p> <p>Outcome – we will continue to monitor this issue, and this will be supported by the capability of text analysis. Further detail of specific promoters and/or contractors to be produced. A target of 10% of all RC codes issued is aimed for.</p>	PSPI-5
2	<p>Works Durations - work will commence to identify average duration for works, considering the works type, promoter and text analysis of the works description and the coordination teams will use this information when considering permit applications (text analysis of job works description is also part of the engagement with Open Road Associates).</p> <p>Outcome - Where possible to measure, works durations are broadly in line with AHAUC guidelines. Issues remain where there is need to identify measurements as well as the activity. If the works description text analysis within the ORA project supports this then this will be incorporated into this action. Monthly performance reporting needs to include a measure/report to show actual works durations measured against AHAUC guidelines.</p>	PSPI-13
3	<p>Late submission of Works Extensions Requests – during the second half of year 5, the issue was raised with all works promoters. If there is no significant improvement in the first quarter of year 6, improvement notices will be issued where required and more direct action taken if found to be appropriate.</p> <p>Outcome - despite several meetings with relevant Statutory Undertakers, there has been no significant reduction in the percentage of late submission of duration requests. Statutory Undertakers were advised that as from 1st November 2018 (start of year 7), the Network Management Operation Team will be refusing all duration extension requests, on planned works, that are submitted late. Monitoring will continue in year 7.</p>	PSPI-11
4	<p>Permit Compliance Inspections - plans are being formulated to increase the number of NRSWA and Permit inspections for HCC Framework sites from April 2018.</p> <p>Outcome – we continue to work towards delivering this action, but this will need to be carried over to year 7 because of contractual issues with HCC Framework Contracts. However, the audit inspections that are carried out on these works will become consistent with NRSWA and Permit Compliance Inspections.</p>	PSPI-16

5-Permit Fee Revenue Review

The operation of the Permit Scheme in Hertfordshire remains broadly cost neutral with the exclusion of avoidable costs e.g. fines. Non-avoidable costs, e.g. permit fees, allow for a number of discounts that have not been taken up by Statutory Undertakers to date. We want to continue to encourage the uptake of discounts that we have already written into the scheme. We have issued a revised Permit Scheme Addendum to include for, and cover, how our scheme discounts relate to those which HAUC/DfT say should be used e.g. programmed scheme works.

Although early results from the Text Analysis work (section 8), can show where conditions have reduced the impact of works, they don't at this stage show where discounts could have been warranted. This will form part of the transition to "business as usual" of this work.

Any further changes of substance will be incorporated in a major scheme variation which will be needed once Street Manager is launched.

6-Cost Benefit Analysis Review

1.1 Cost Benefit Analysis – Years 1 to 3

1.1.1 A cost-benefit analysis was undertaken before scheme implementation to assess whether the permit scheme was likely to deliver societal benefits in excess of the cost of implementing and operating the scheme, and hence whether the scheme should go ahead.

1.1.2 With three years of post scheme data, we take this opportunity to review the value of the scheme with the benefit of a number of years of outturn scheme operating costs and revenues, and updated estimates of the societal impact of roadwork and how these may differ under the permit scheme.

1.1.3 A headline summary of the approach adopted is as follows:

- Identify the scale and characteristics of roadworks which have taken place in the first three years of permit scheme operation, and quantify the scale of societal impact that these roadworks will have had;
- Estimate the reduction in roadworks resulting from the permit scheme and quantify the benefits of this reduction;
- Identify the cost of setting up and operating the permit scheme since its inception;
- Undertake the cost benefit analysis to determine the benefit to cost ratio and net present value delivered by the scheme.

1.2 Scale and characteristics of roadworks

1.2.1 The table below shows the volume of works and days of works for the first three years of permit operation (November 2012 to November 2015). In the period 2012/13, 33,730 individual roadwork events were recorded, representing 162,712 days of roadworks.

1.2.2 For the period 2013/14, 36,139 individual roadwork events were recorded, however the days of roadworks reduced to 161,273, representing a 1% reduction in the total duration of roadworks.

1.2.3 Finally, for the period 2014/15, the number of individual roadwork events and days of roadworks reduced significantly to 28,959 and 133,073 respectively, representing a 20% reduction in volume of works and 17% reduction in duration.

1.2.4 The estimated impact of these roadworks was modelled using QUADRO, with multiple model runs undertaken to provide estimates of the daily impact of different types of roadwork disaggregated by location, road type and traffic management arrangements.

1.2.5 The modelled impact of typical roadworks in Hertfordshire forms the basis of the benefits calculation. The roadwork impact estimates include the following elements:

- Road user travel time (delay caused to consumer and business as a result of roadworks)
- Road user vehicle operating costs (the impact of delay and diversion on vehicle operating costs for consumers and business)
- Accident costs
- Emissions costs (resulting from congested conditions and diversion)
- Indirect tax revenue (increased tax revenue to the exchequer as a result of higher fuel consumption)

1.2.6 The modelled monetary cost of a single day of roadworks provides the means of estimating the total impact of roadworks each year, calculated as follows:

Year	Societal cost of a single day of 'typical' roadworks	Total duration of roadworks	Total cost impact of roadworks in Hertfordshire
2012/13 (Year 1)	£264.84	162,712	£43,092,209
2013/14 (Year 2)	£548.51	161,273	£88,459,499
2014/15 (Year 3)	£581.62	133,073	£77,397,660

1.2.7 Since Year 1 (2012/13) of permit scheme operation the cost of a single day of 'typical' roadworks has increased considerably, and as such has increased the total cost impact of roadworks in Hertfordshire. However, this is largely driven by the shift in composition of roadworks from lower impact traffic management, such as carriageway incursion, to high impact traffic management, such as road closures and shuttle working. In particular, roadworks on urban single carriageways involving shuttle working have increased from 8% of total works in Year 1 (2012/13) to 17% in Year 3 (2014/15). This is shown in the table below.

Locality	Road Type	Works Type	Year 1	Year 2	Year 3
Rural	Dual 2-Lane	Lane Closure	0%	0%	0%
		Road Closure	0%	0%	0%
		Some Carriageway Incursion	2%	1%	1%
	Single 2-Lane	Lane Closure	0%	0%	0%
		Road Closure	1%	2%	2%
		Some Carriageway Incursion	25%	22%	19%
		Shuttle Working	4%	6%	8%
Urban	Dual 2-Lane	Lane Closure	0%	1%	1%
		Road Closure	0%	0%	0%
		Some Carriageway Incursion	3%	2%	1%
	Single 2-Lane	Lane Closure	0%	1%	1%
		Road Closure	2%	4%	4%
		Some Carriageway Incursion	55%	49%	45%
		Shuttle Working	8%	12%	17%

1.3 Quantification of benefit of permit scheme

1.3.1 The benefits of the permit scheme are expected to be achieved through more efficient and better managed roadwork events taking place compared to the patterns observed before scheme implementation. The default assumption relating to anticipated impact of a permit scheme is to observe a benchmark 5% reduction in roadwork impact (as stated in the DfT Permit Scheme Evaluation Guidance, 2016).

1.3.2 Post scheme data provides the opportunity to review trends, although the comparison should not be 'before' vs. 'after', but 'with' vs 'without' scheme. General year-to-year fluctuations in the number of roadworks occurring and changes in the practice and quality of reporting events makes determining the underlying trend challenging.

1.3.3 We therefore draw on established practice in the estimation of scheme impact, taking the benchmark 5% reduction in roadwork impact value. As such, the societal impact of roadworks observed in each year from 2012/13 onwards can be expected to represent 95% of the overall societal cost of roadworks which would have been incurred in the absence of the permit scheme.

1.3.4 The benefit of the scheme can hence be calculated as follows:

Year	Total cost impact of roadworks with scheme (95%)	Societal cost of roadworks without scheme (100%)	Scheme impact (reduction in roadwork impact)
2012/13 (Year 1)	£43,092,209	£45,360,220	£2,268,011
2013/14 (Year 2)	£88,459,499	£93,115,262	£4,655,763
2014/15 (Year 3)	£77,397,660	£81,471,221	£4,073,561

1.3.5 Scheme benefits ranging from £2.27m to £4.65m per annum are estimated to have been generated through implementation of the permit scheme in its first years of operation.

1.3.6 The cost benefit appraisal requires that scheme benefits are appraised against scheme costs over the whole appraisal period, which in this case guidance defines as being 25 years. Consequently, the benefits calculated over the first 3 years of operation are projected forward over following years (based on the average benefit across the three years), increasing in real terms to reflect growth in values of time, vehicle operating costs, accident savings and emissions costs.

1.4 Scheme Costs

1.4.1 Having established scheme benefits, these must be set against scheme costs to determine value for money. Permit scheme costs elements include the following:

- Setup costs
- Scheme operating costs (staff, consultants, maintenance/running costs)
- Scheme capital costs – IT equipment, software etc

1.4.2 Importantly, the permit scheme costs included within the appraisal are the *additional costs* of operating the permit scheme above those incurred previously incurred in delivering the council duties with regard to roadwork applications. By considering the incremental costs, this fairly compares the 'with permit scheme' scenario with the 'business as usual (ie no permit scheme) scenario.

1.4.3 The cost assumptions relating to the scheme are detailed below:

1.4.4 Scheme **setup costs** include consultancy fees and internal staff time in the preparation and implementation of the scheme. These were estimated to be £728,819 (2012 factor prices).

1.4.5 The **operating costs** of the permit scheme principally relate to the additional internal staff resources required to process permit applications and additional operating factors to administer the permit scheme, such as finance payment and reconciliation, performance and evaluation. To identify an operational costs a proportion of each role within the Councils network management service was assigned to permit scheme administration.

1.4.6 Operating costs for the first three years of operations, incremental to those incurred previously, are estimated to be £2,039,762, £2,039,762, 2,001,662 respectively (nominal factor prices).

1.4.7 The **capital costs** for the permit scheme implementation can include elements such as new IT hardware and software etc.

1.4.8 Overhead costs for additional software licenses have been accounted for within the staff overhead costs. These licensing costs are deemed more appropriate to be reflected in the operational costs as these represent ongoing annual costs. Therefore, no specific capital costs are identified in relation to permit scheme implementation.

1.4.9 Costs are converted to market prices through the application of the indirect tax correction factor of 1.19. Cost factors are also projected over the period of the appraisal, growing in line with real wages.

1.5 Scheme Revenues

1.5.1 The permit scheme has generated revenues which go some way to offsetting the scheme costs of operating the scheme. Permit revenues are based on the permit fee level and on the number of permits issued.

1.5.2 Scheme revenues for the first three years are as follows (nominal prices):

- 2012/13 (Year 1) - £1,770,545
- 2013/14 (Year 2) £1,846,943
- 2014/15 (Year 3) - £1,819,495

1.5.3 Within the appraisal, scheme revenues are netted from operating costs to the council. However, the permit revenues are also represented as a cost (disbenefit) to business, reflecting the payment being made by scheme promoters.

1.6 Appraisal Results

1.6.1 The cost benefit analysis takes the benefits and costs established from the first year of operation projects these over the 25-year appraisal period. The future cost and benefit streams are discounted using the standard discount rate of 3.5%, meaning that near term costs and benefits are valued more highly than those occurring later in the appraisal period.

1.6.2 The results of the cost benefit analysis are as follows:

- | | |
|--------------------------------------|--------------|
| • Net present benefits of scheme (B) | £50,754,162 |
| • Net present cost of scheme (C) | £23,2845,795 |
| • Net Present Value of scheme (B-C) | £26,908,367 |
| • Benefit to Cost Ratio (B/C) | 2.13 |

1.6.3 The scheme benefits are seen to outweigh scheme costs, providing a significant net present value of £26.9m. The benefit to cost ratio (BCR), which provides a measure of value-for-money exhibited by a scheme returns a value of 2.13 which represents 'High Value for Money'.

Appendix 1: Societal cost to Hertfordshire County Council due to Roadworks

Average Roadwork Cost / day £ 2010 prices		Annual (Year 1 – 2012/13)	Annual (Year 2 – 2013/14)	Annual (Year 3 – 2014/15)
Consumer Travel Time	Cars and Private LGVs	14,568,138	28,820,119	25,633,401
	Goods Vehicles and Business LGVs	-	-	-
	Bus and Coach	1,364,828	2,741,912	2,501,594
Consumer VOC	Cars and Private LGVs	11,100,081	23,908,945	20,491,850
	Goods Vehicles and Business LGVs	-	-	-
	Bus and Coach	-	-	-
Business Travel Time	Cars and Private LGVs	4,536,271	8,931,683	7,940,905
	Goods Vehicles and Business LGVs	4,324,981	8,546,799	7,581,487
	Bus and Coach	354,071	715,509	653,317
Business VOC	Cars and Private LGVs	1,248,243	2,686,881	2,304,841
	Goods Vehicles and Business LGVs	4,077,227	8,747,724	7,351,658
	Bus and Coach	-	-	-
Private Sector Provider VOC	Bus and Coach	963,483	2,059,705	1,820,603
Accident Costs		2,164,210	4,690,804	3,959,425
Carbon Emission Costs		2,459,555	5,366,775	4,584,100
Indirect Tax Revenues		- 4,068,879	- 8,757,357	- 7,425,518
Total		£41,414,805	£86,738,043	£75,707,440

Appendix 2: AMCB Appraisal Table

Analysis of Monetised Costs and Benefits

Noise		(12)
Local Air Quality		(13)
Greenhouse Gases	5,237,593	(14)
Journey Quality		(15)
Physical Activity		(16)
Accidents	4,564,656	(17)
Economic Efficiency: Consumer Users (Commuting)	22,140,421	(1a)
Economic Efficiency: Consumer Users (Other)	33,210,631	(1b)
Economic Efficiency: Business Users and Providers	- 5,851,033	(5)
Wider Public Finances (Indirect Taxation Revenues)	8,548,105	- (11) - sign changed from PA table, as PA table represents costs, not benefits
Present Value of Benefits (see notes) (PVB)	50,754,162	(PVB) = (12) + (13) + (14) + (15) + (16) + (17) + (1a) + (1b) + (5) - (11)
Broad Transport Budget	23,845,795	(10)
Present Value of Costs (see notes) (PVC)	23,845,795	(PVC) = (10)
OVERALL IMPACTS		
Net Present Value (NPV)	26,908,367	NPV=PVB-PVC
Benefit to Cost Ratio (BCR)	2.13	BCR=PVB/PVC

Note : This table includes costs and benefits which are regularly or occasionally presented in monetised form in transport appraisals, together with some where monetisation is in prospect. There may also be other significant costs and benefits, some of which cannot be presented in monetised form. Where this is the case, the analysis presented above does NOT provide a good measure of value for money and should not be used as the sole basis for decisions.

We invested a significant resource – monetary and staff time – in producing the above CBA for years 1 to 3 of the scheme operations. As mentioned, this CBA covers a 25-year period, and considers a multitude of factors. As there has been no significant change in the larger influencing factors e.g. network length, network occupancy and number of works, HCC do not see the benefit of spending further time and money to produce another CBA for years 4 to 6 when there is negligible change to the constituent parts of the CBA detailed above.

7-Individual Performance Measures

The remainder of this report contains data and analysis for each of the Permit Scheme Performance Indicators (PSPI). Measures should be considered on their individual merits and not necessarily linked together. This is due to the desire to include measures that demonstrate how the objectives and benefits of the scheme are being delivered. Additionally, the data constraints of EToN, for example the separate number of PAAs, Permits or Variations that are refused cannot be determined due to one EToN transaction for all refusals.

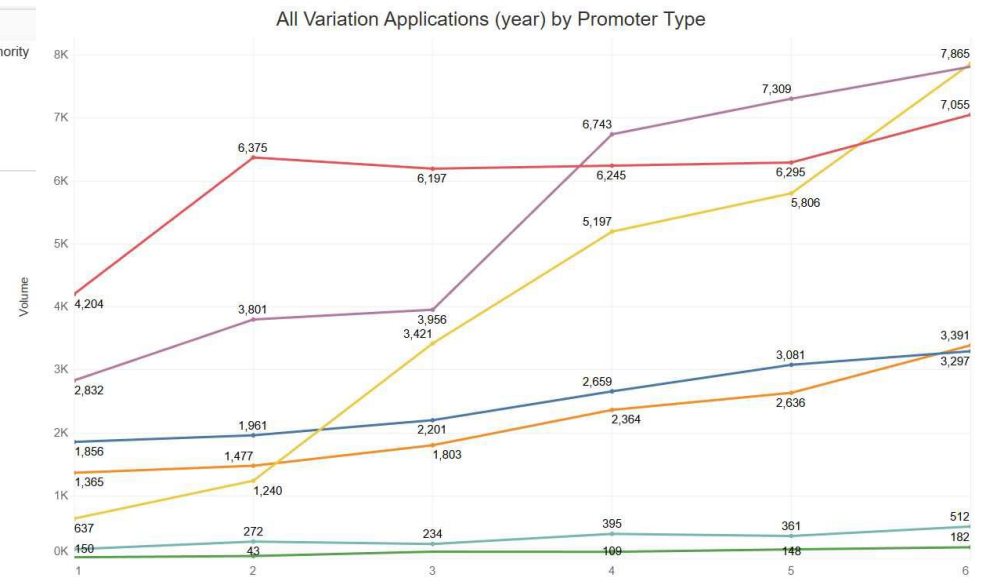
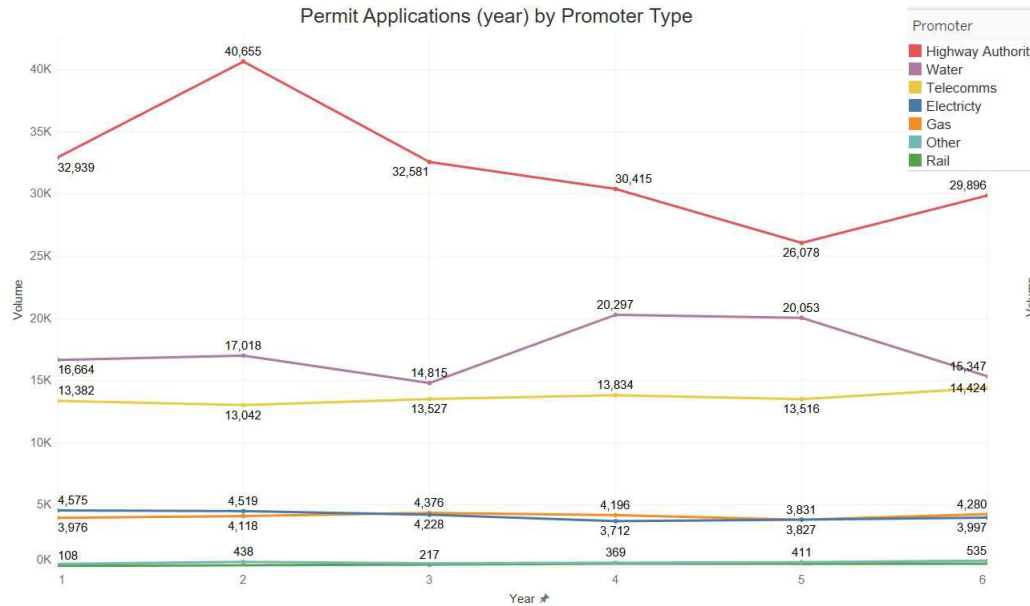
PSPI-1 Permit Applications

Description

The number of Permit and Variation Applications received by works type and promoter type (year 6)

		Highway Authority	Electricity	Gas	Rail	Telecomms	Water	Other	Total
Major	Application	5,258	421	1,154	170	1,022	818	174	9,017
	Variation	2,188	242	740	44	462	648	86	4,410
Standard	Application	2,129	824	967	14	956	585	154	5,629
	Variation	1,915	1,278	997	27	933	854	251	6,255
Minor	Application	3,959	483	861	100	10,722	7,572	189	23,886
	Variation	2,174	460	596	110	6,292	6,106	175	15,913
Immediate	Application	18,550	2,269	1,298	5	1,724	6,372	18	30,236
	Variation	778	1,317	1,058	1	178	2,101		5,433
Total		36,951	7,294	7,671	471	22,289	25,056	1,047	100,779

Yearly Summary



Analysis

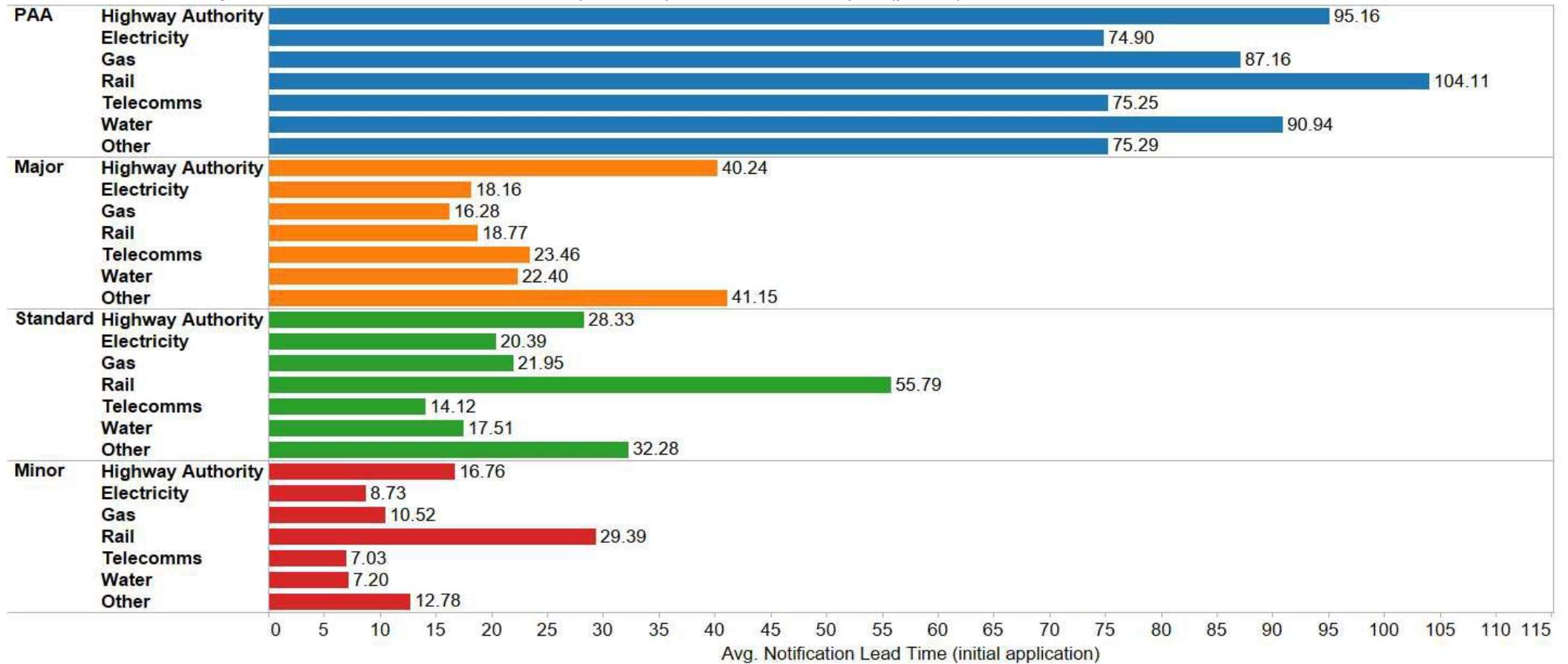
Applications - no meaningful analysis can be drawn from these volumes as there are numerous factors, outside the control of the Permit Scheme, that will influence the number of works carried out on the Highway.

Variations – it is disappointing to see a further increase in the overall volume of variation applications received, particularly from certain Statutory Undertakers. Further analysis and actions are noted within PSPI 7.

PSPI-2 Application Lead Time

Description

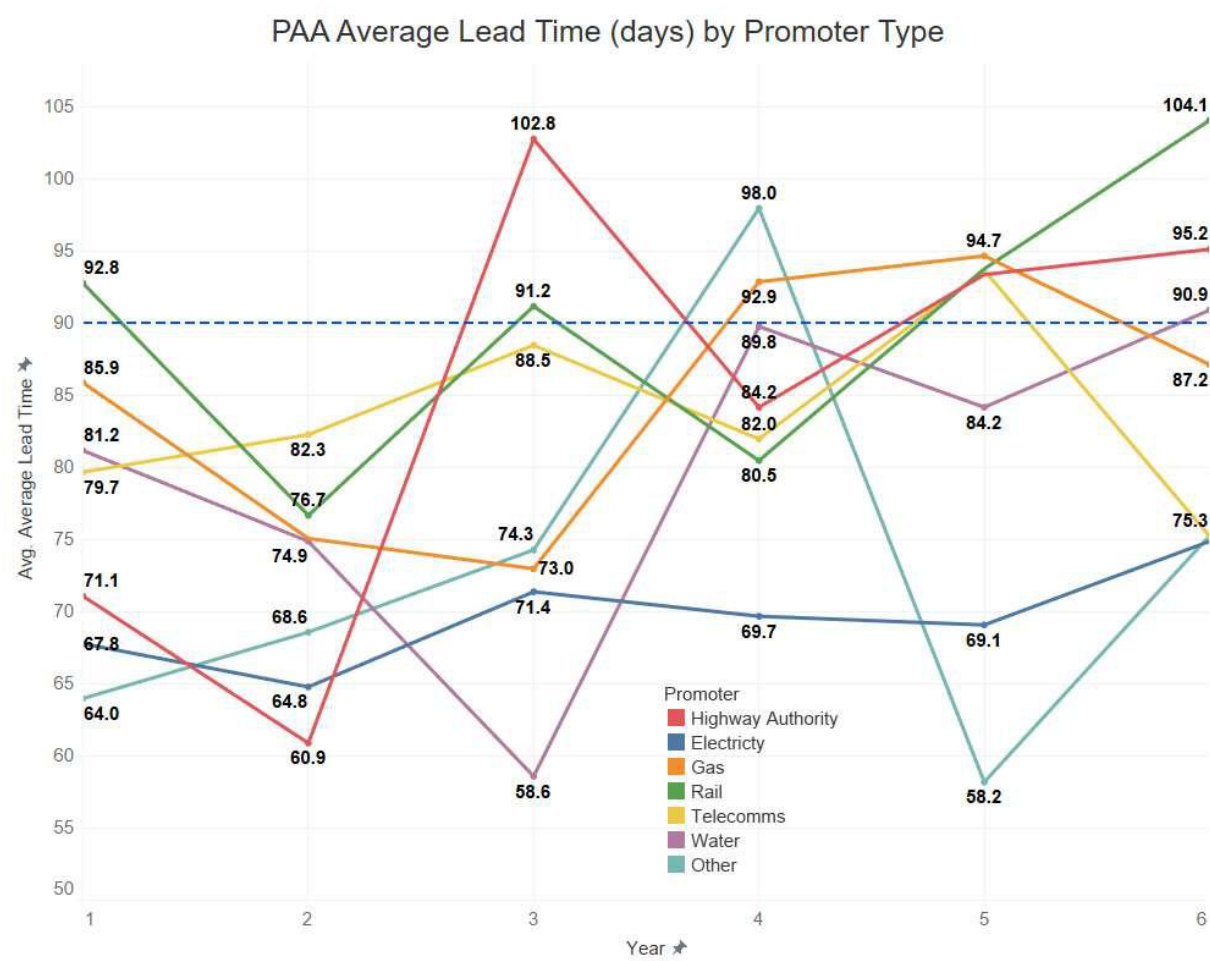
The average lead time for Permit Applications by works type and promoter type (year 6)



Analysis

Whilst the overall year's averages are acceptable, PAA applications from certain promoter types continue to be below target although the number of applications is low and therefore the impact is low.

Yearly Summary



PSPI-3 Reducing the Application Period (Early Starts)

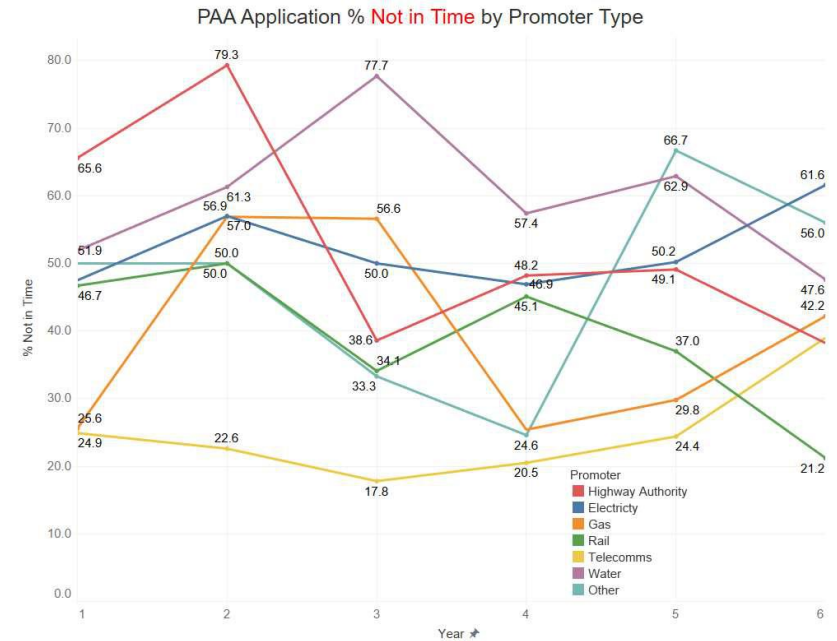
Description

The volume and % of applications received either 'in-time' or 'not in time' by works type and promoter type.

Year 6

		Highway Authority	Electricity	Gas	Rail	Telecomms	Water	Other	Total
PAA	In Time	1,829 61.8%	111 38.4%	419 57.8%	82 78.8%	393 61.0%	259 52.4%	48 44.0%	3,141 59.0%
	Not in Time	1,129 38.2%	178 61.6%	306 42.2%	22 21.2%	251 39.0%	235 47.6%	61 56.0%	2,182 41.0%
Major	In Time	2,000 86.8%	107 81.1%	275 64.1%	60 90.9%	276 73.0%	263 81.2%	48 73.8%	3,029 81.9%
	Not in Time	303 13.2%	25 18.9%	154 35.9%	6 9.1%	102 27.0%	61 18.8%	17 26.2%	668 18.1%
Standard	In Time	1,516 71.3%	752 91.3%	918 94.9%	12 85.7%	807 84.4%	495 84.6%	139 90.3%	4,639 82.4%
	Not in Time	611 28.7%	72 8.7%	49 5.1%	2 14.3%	149 15.6%	90 15.4%	15 9.7%	988 17.6%
Minor	In Time	3,786 95.7%	464 96.1%	842 97.8%	100 100.0%	10,566 98.5%	7,487 98.9%	186 98.4%	23,431 98.1%
	Not in Time	172 4.3%	19 3.9%	19 2.2%		156 1.5%	85 1.1%	3 1.6%	454 1.9%
Immediate	In Time	17,254 93.0%	2,210 97.4%	1,241 95.6%	5 100.0%	1,667 96.7%	6,144 96.4%	16 88.9%	28,537 94.4%
	Not in Time	1,296 7.0%	59 2.6%	57 4.4%		57 3.3%	228 3.6%	2 11.1%	1,699 5.6%

Yearly Summary



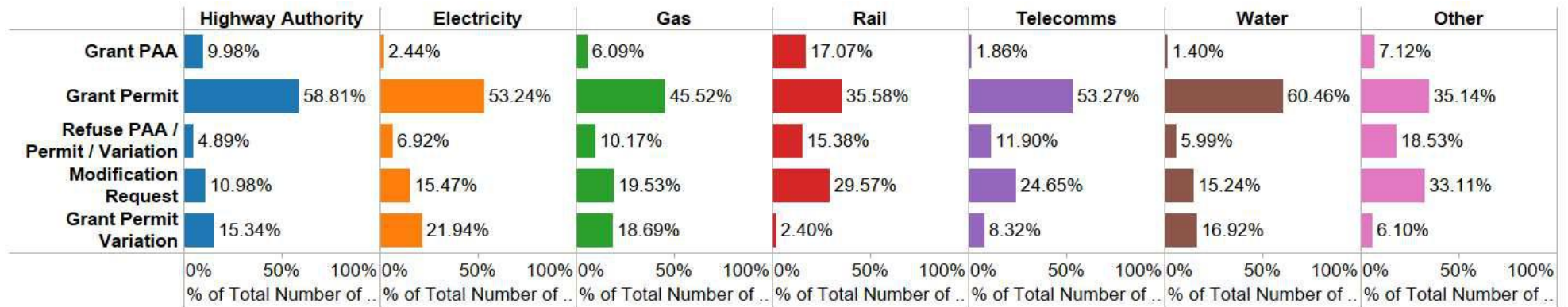
Analysis

The percentage of PAA Applications received not in time for certain promoter groups is cause for concern, particularly when the volume of applications, and their locations, are considered and the subsequent impact to the network in terms of communication, journey planning and collaboration opportunities.

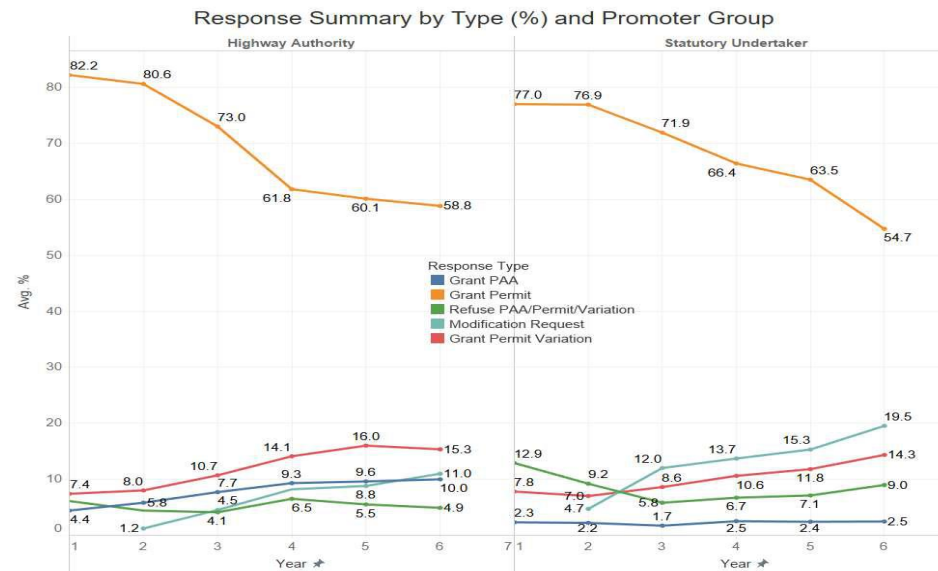
PSPI-4 Application Responses - Summary

Description

This measure focuses on the overall responses to all applications and is designed to show the effect of positive coordination by the Network Management team. The data is shown by percentage response type used and should not be considered by application type e.g. 9.9% of all responses of all application types from Highways were Grant PAA not 9.9% of Highways PAAs were granted.



Yearly Summary



PSPI-4 Application Responses - Detail

Description

This shows the data above for year 6 broken down by works type and includes volumes.

		Highway ..	Electricity	Gas	Rail	Telecom..	Water	Other	Total
Major	Grant PAA	2,159 33.64%	152 28.10%	416 25.77%	71 36.79%	376 29.44%	308 24.62%	63 27.16%	3,545 30.76%
	Grant Permit	2,183 34.01%	110 20.33%	322 19.95%	63 32.64%	305 23.88%	257 20.54%	46 19.83%	3,286 28.51%
	Refuse PAA / Permit / Variation	384 5.98%	111 20.52%	319 19.76%	28 14.51%	274 21.46%	196 15.67%	64 27.59%	1,376 11.94%
	Modification Request	555 8.65%	101 18.67%	241 14.93%	29 15.03%	178 13.94%	256 20.46%	43 18.53%	1,403 12.17%
	Grant Permit Variation	1,137 17.72%	67 12.38%	316 19.58%	2 1.04%	144 11.28%	234 18.71%	16 6.90%	1,916 16.62%
Standard	Grant Permit	1,849 50.53%	736 39.51%	772 42.42%	9 26.47%	598 34.49%	451 37.12%	116 33.92%	4,531 42.48%
	Refuse PAA / Permit / Variation	236 6.45%	228 12.24%	235 12.91%	1 2.94%	334 19.26%	119 9.79%	63 18.42%	1,216 11.40%
	Modification Request	616 16.84%	597 32.05%	651 35.77%	24 70.59%	578 33.33%	377 31.03%	134 39.18%	2,977 27.91%
	Grant Permit Variation	958 26.18%	302 16.21%	162 8.90%		224 12.92%	268 22.06%	29 8.48%	1,943 18.22%
Minor	Grant Permit	3,586 62.65%	420 49.70%	749 55.65%	74 39.78%	8,501 54.19%	6,729 54.61%	137 45.82%	20,196 55.47%
	Refuse PAA / Permit / Variation	405 7.08%	86 10.18%	137 10.18%	34 18.28%	1,787 11.39%	976 7.92%	37 12.37%	3,462 9.51%
	Modification Request	1,192 20.82%	243 28.76%	413 30.68%	70 37.63%	4,214 26.86%	2,682 21.77%	116 38.80%	8,930 24.53%
	Grant Permit Variation	541 9.45%	96 11.36%	47 3.49%	8 4.30%	1,184 7.55%	1,934 15.70%	9 3.01%	3,819 10.49%
Immediate	Grant Permit	5,109 87.50%	2,052 68.79%	1,264 61.78%	2 66.67%	1,342 90.86%	5,872 81.25%	12 100.00%	15,653 79.92%
	Refuse PAA / Permit / Variation	34 0.58%	6 0.20%	3 0.15%	1 33.33%	6 0.41%	27 0.37%		77 0.39%
	Modification Request	12 0.21%	23 0.77%	28 1.37%		3 0.20%	40 0.55%		106 0.54%
	Grant Permit Variation	684 11.71%	902 30.24%	751 36.71%		126 8.53%	1,288 17.82%		3,751 19.15%

Analysis

The decrease in the % of granted permits, coupled with the increase in modification requests, reflects the initiatives deployed by the coordination team during year 6 to ensure compliance and accuracy of granted permits in addition to using good coordination practices. This includes removing unnecessary conditions, removing ambiguous data, challenging traffic management types and ensuring compliance to the National Conditions.

PSPI-5 Permit Response Codes

Description

HCC introduced the Standard Permit Responses codes in December 2015 (year 4). Data is displayed by volume and type for year 6. NCU denotes no code used in response comment.

	Highway							Total		Highway							Total	
	Authority	Electricity	Gas	Rail	Telecomms	Water	Other			Authority	Electricity	Gas	Rail	Telecomms	Water	Other		
NCU	107	84	101	2	161	305	13	773	NCU	2.67%	4.05%	3.97%	1.04%	2.07%	4.90%	2.75%	3.32%	
RC10	693	598	532	50	1,208	1,369	74	4,524	RC10	17.32%	28.81%	20.90%	26.04%	15.51%	22.01%	15.68%	19.42%	
RC11	775	540	623	46	1,825	1,544	107	5,460	RC11	19.37%	26.01%	24.47%	23.96%	23.43%	24.82%	22.67%	23.44%	
RC12	38	16	48		183	62	16	363	RC12	0.95%	0.77%	1.89%		2.35%	1.00%	3.39%	1.56%	
RC20	28	8	13		11	14		74	RC20	0.70%	0.39%	0.51%		0.14%	0.23%		0.32%	
RC21	2				1			3	RC21	0.05%				0.01%				0.01%
RC22	329	99	104	7	243	240	9	1,031	RC22	8.22%	4.77%	4.08%	3.65%	3.12%	3.86%	1.91%	4.43%	
RC23	256	79	128	10	528	409	15	1,425	RC23	6.40%	3.81%	5.03%	5.21%	6.78%	6.57%	3.18%	6.12%	
RC30	68	15	26	5	163	62	17	356	RC30	1.70%	0.72%	1.02%	2.60%	2.09%	1.00%	3.60%	1.53%	
RC31	438	117	157	13	1,084	462	40	2,311	RC31	10.95%	5.64%	6.17%	6.77%	13.92%	7.43%	8.47%	9.92%	
RC32	47	41	59	1	101	82	16	347	RC32	1.17%	1.97%	2.32%	0.52%	1.30%	1.32%	3.39%	1.49%	
RC33	49	44	53	1	232	136	18	533	RC33	1.22%	2.12%	2.08%	0.52%	2.98%	2.19%	3.81%	2.29%	
RC40	38	15	33	1	72	51	13	223	RC40	0.95%	0.72%	1.30%	0.52%	0.92%	0.82%	2.75%	0.96%	
RC41	415	141	209	11	711	617	30	2,134	RC41	10.37%	6.79%	8.21%	5.73%	9.13%	9.92%	6.36%	9.16%	
RC42	4		2	1	10	8		25	RC42	0.10%		0.08%	0.52%	0.13%	0.13%		0.11%	
RC44	30	28	54		44	43	13	212	RC44	0.75%	1.35%	2.12%		0.56%	0.69%	2.75%	0.91%	
RC50	684	251	404	44	1,212	817	91	3,503	RC50	17.10%	12.09%	15.87%	22.92%	15.56%	13.13%	19.28%	15.04%	
Total	4,001	2,076	2,546	192	7,789	6,221	472	23,297										

Analysis

Works has continued through year 6 to reduce the volume of responses where no code has been used and the instances of RC31 (Clash of Works) has been closely monitored - by promoter – and high volumes have been flagged to the relevant promoters. RC11 (Condition Not Provided/Not Necessary) continues to remain high, further detail below.

PSPI-5a Response Code 11 (Unnecessary or Missing Conditions)

Description

A specific year 6 action was to try and reduce the volume of RC11(unnecessary or missing conditions). This has met with mixed results. The table below displays the % by Promoter Type of all instances of where RC11 was issued.

		Nov-17	Dec-17	Jan-18	Feb-18	Mar-18	Apr-18	May-18	Jun-18	Jul-18	Aug-18	Sep-18	Oct-18	Total
Highway	RC11	13.23%	10.16%	16.59%	11.79%	9.64%	21.77%	14.92%	18.03%	15.27%	19.11%	9.72%	9.56%	14.19%
Electricity	RC11	9.62%	8.58%	11.85%	9.13%	13.45%	11.21%	7.33%	9.84%	9.62%	7.46%	9.44%	10.26%	9.89%
Gas	RC11	14.03%	12.87%	10.34%	10.84%	11.65%	11.85%	7.59%	8.81%	5.23%	12.82%	18.61%	13.75%	11.41%
Rail	RC11	1.20%	1.13%		0.76%	0.60%	1.72%	0.52%	1.02%	1.05%		1.11%	0.93%	0.84%
Telecomms	RC11	27.25%	36.12%	28.23%	40.11%	36.95%	29.53%	40.84%	36.68%	31.38%	27.04%	29.72%	36.83%	33.42%
Water	RC11	33.07%	29.80%	31.47%	26.62%	27.11%	22.20%	27.23%	23.36%	35.36%	29.37%	28.61%	24.94%	28.28%
Other	RC11	1.60%	1.35%	1.51%	0.76%	0.60%	1.72%	1.57%	2.25%	2.09%	4.20%	2.78%	3.73%	1.96%

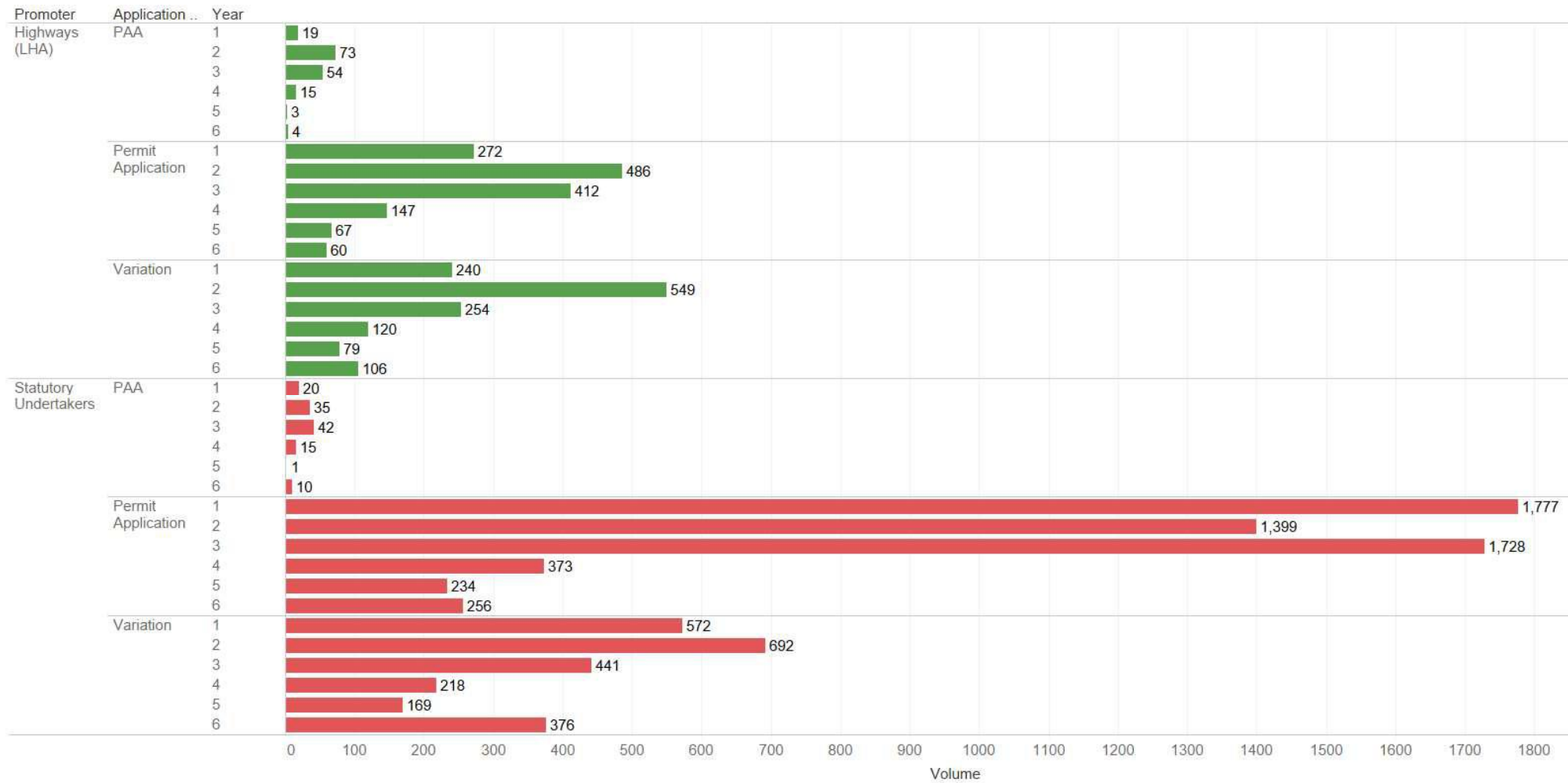
Analysis

Work will continue to reduce this unnecessary administrative burden and it is hoped that Works Promoters will recognise the value of this too.

PSPI-6 Deemed Applications

Description

The volume of deemed items



Analysis

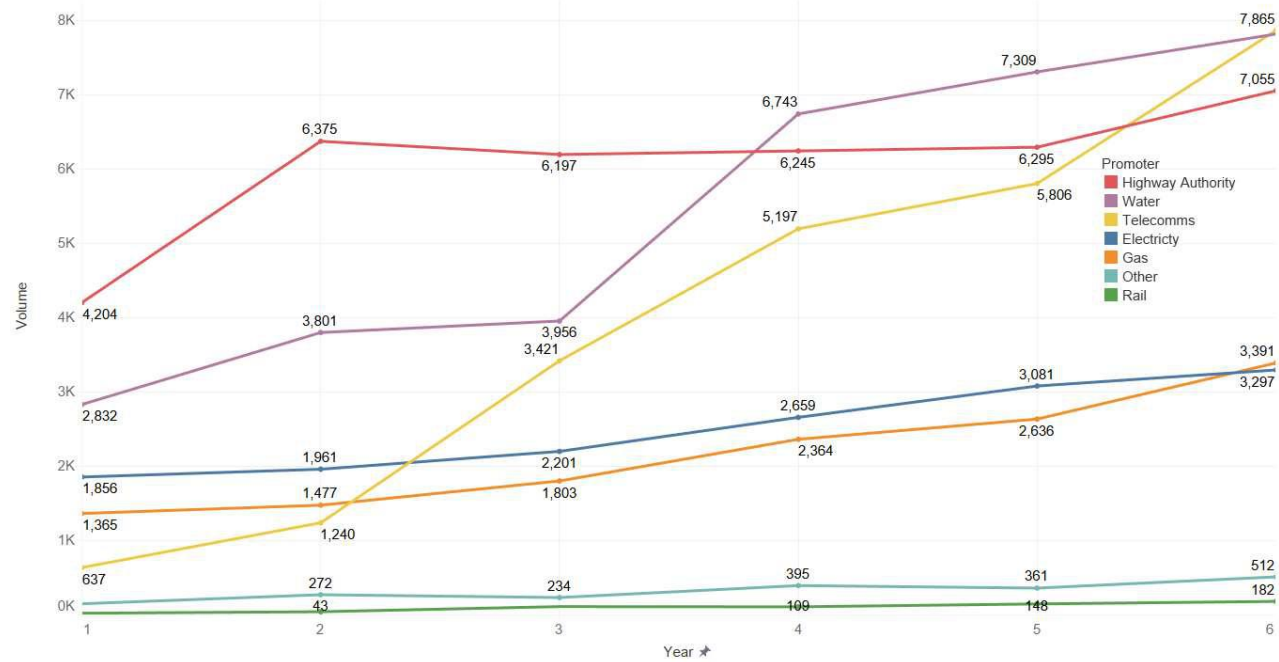
The volume of deemed items continues to be closely monitored. This ensures that our network is effectively managed.

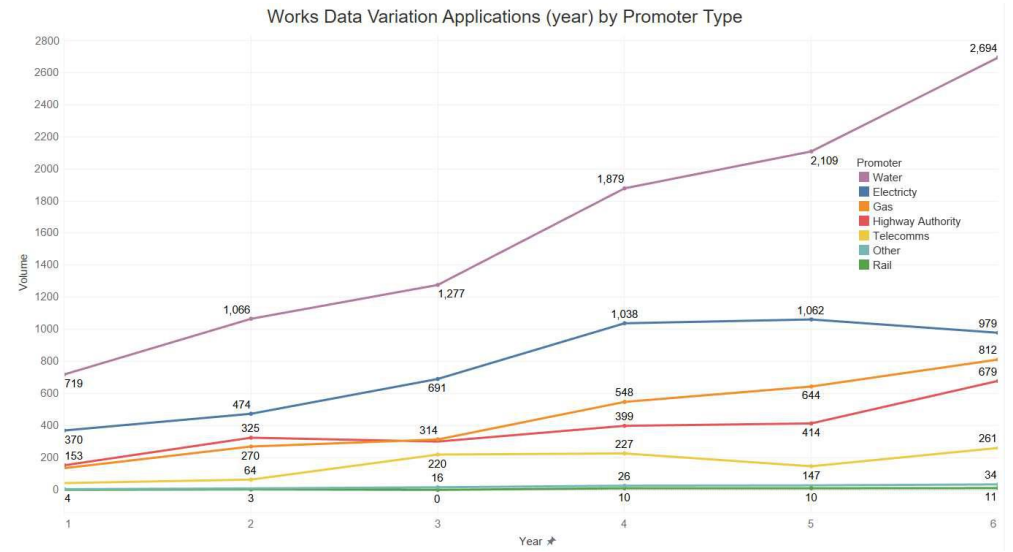
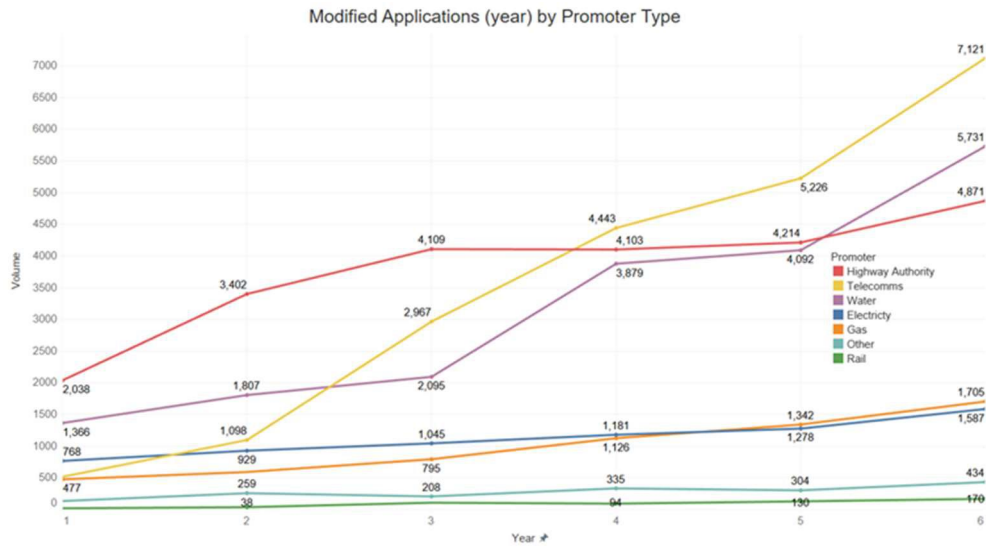
Description

The number of variation applications, by type and works promoter (year 6)

		Highway Authority	Electricity	Gas	Rail	Telecomms	Water	Other	Total
Modified Application	Major	1,430	179	392	41	336	398	63	2,839
	Standard	1,544	1,007	788	26	795	611	207	4,978
	Minor	1,882	401	525	103	5,990	4,722	164	13,787
	Immediate	15							15
Works Data Variation (WIP)	Major	442	19	115	2	57	110	6	751
	Standard	84	108	114	1	42	138	18	505
	Minor	137	23	43	7	70	1,012	10	1,302
	Immediate	16	829	540	1	92	1,434		2,912
Duration Variation Application (WIP)	Major	316	44	233	1	69	140	17	820
	Standard	287	163	95		96	105	26	772
	Minor	155	36	28		232	372	1	824
	Immediate	747	488	518		86	667		2,506
Total		7,055	3,297	3,391	182	7,865	9,709	512	32,011

All Variation Applications (year) by Promoter Type





Refer to PSPI-11 for Duration Extension data

Analysis

The increase in volumes is partly due to the increase in Modification Requests issued by the Authority when delivering year 6 actions. Works Promoters are urged to review these requests to reduce the volumes of unnecessary transaction and focus on promoting a “right first time” policy. The unnecessary volume of works data variations in response to AIVs on Immediate works is clearly shown in the table for year 6 – further information is at page 33.

Description

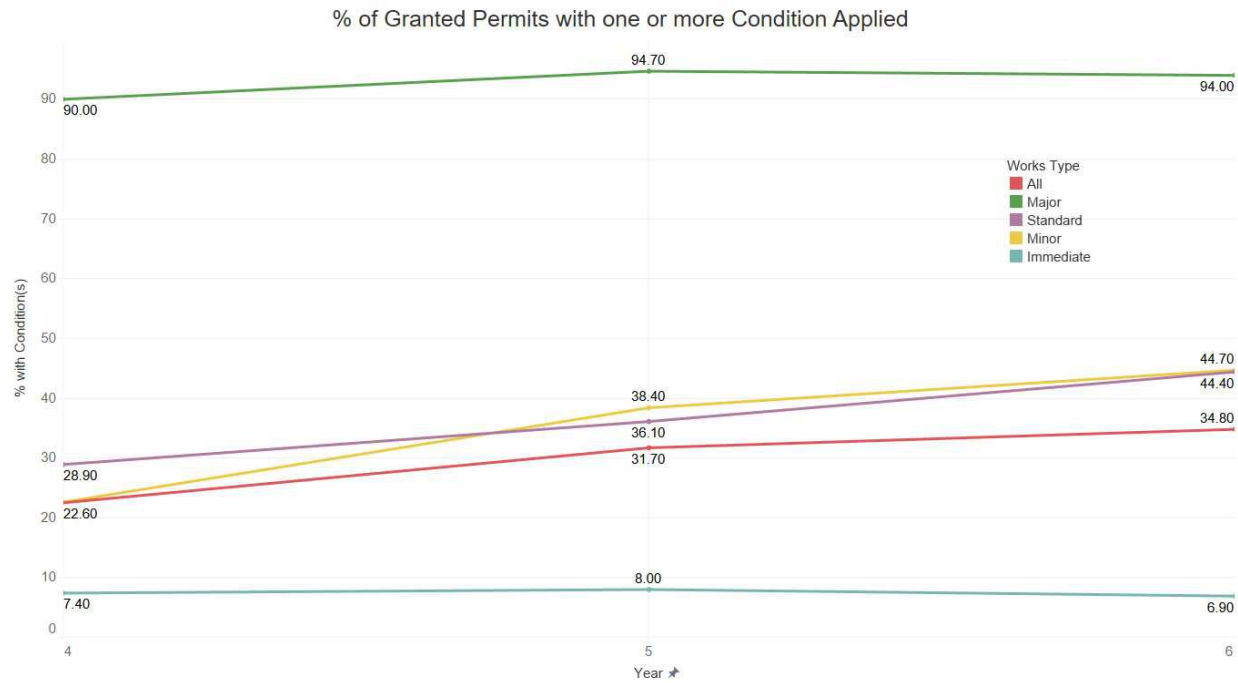
The volume of granted permits and total conditions applied is shown along with the % of permits with one or more condition type applied in year 6. Additionally, a breakdown of the NCT codes applied is shown.

		Highway Authority	Electricity	Gas	Rail	Telecom..	Water	Other	Total
Major	Granted Permits	2,183	110	322	63	305	257	46	3,286
	Total Codes Applied	3,432	259	592	154	1,430	835	133	6,835
	Permits with Condition(s) %	93.6%	91.8%	88.8%	100.0%	99.3%	95.3%	100.0%	94.0%
Standard	Granted Permits	1,849	736	772	9	598	451	116	4,531
	Total Codes Applied	766	565	557	34	1,195	869	248	4,234
	Permits with Condition(s) %	26.4%	41.4%	41.2%	100.0%	74.7%	79.2%	76.7%	44.4%
Minor	Granted Permits	3,586	420	749	74	8,501	6,729	137	20,196
	Total Codes Applied	2,410	253	682	201	9,485	3,248	262	16,541
	Permits with Condition(s) %	41.0%	34.8%	52.2%	98.6%	55.7%	31.1%	81.0%	44.7%
Immediate	Granted Permits	5,109	2,052	1,264	2	1,342	5,872	12	15,653
	Total Codes Applied	96	31	8	3	943	1,015	17	2,113
	Permits with Condition(s) %	1.4%	0.9%	0.5%	100.0%	21.3%	11.8%	66.7%	6.9%
Total	Granted Permits	12,727	3,318	3,107	148	10,746	13,309	311	43,666
	Total Codes Applied	6,704	1,108	1,839	392	13,053	5,967	660	29,723
	Permits with Condition(s) %	32.0%	17.2%	32.2%	99.3%	53.7%	25.4%	81.7%	34.8%

All Streets

Traffic Sensitive Streets Only

	Major	Standard	Minor	Immediate	Total	Granted Permits	Major	Standard	Minor	Immediate	Total
Granted Permits	3,286	4,531	20,196	15,653	43,666	Granted Permits	1,498	2,373	9,826	7,432	21,129
NCT01a	25	10	133	162	330	NCT01a	11	8	103	90	212
NCT01b	1	3	19	9	32	NCT01b	0	0	9	2	11
NCT02a	697	1,031	6,011	211	7,950	NCT02a	373	791	5,139	162	6,465
NCT02b	809	258	636	19	1,722	NCT02b	228	168	501	13	910
NCT03	3	1	15	0	19	NCT03	3	1	11	0	15
NCT04a	45	157	450	53	705	NCT04a	25	106	328	7	466
NCT04b	36	90	52	67	245	NCT04b	15	39	30	41	125
NCT05a	238	221	798	92	1,349	NCT05a	139	92	450	77	758
NCT06a	174	331	1,841	169	2,515	NCT06a	124	195	1,143	135	1,597
NCT07a	366	5	4	203	578	NCT07a	182	3	1	97	283
NCT08a	188	503	1,754	286	2,731	NCT08a	140	397	1,543	262	2,342
NCT08b	86	307	874	159	1,426	NCT08b	83	280	820	154	1,337
NCT09a	250	153	236	8	647	NCT09a	140	99	144	3	386
NCT09b	9	39	59	0	107	NCT09b	6	20	44	0	70
NCT09c	184	633	2,363	416	3,596	NCT09c	137	527	2,078	385	3,127
NCT10a	51	120	359	52	582	NCT10a	30	83	300	19	432
NCT11a	89	86	361	190	726	NCT11a	60	60	208	106	434
NCT11b	2,915	155	158	14	3,242	NCT11b	1,277	91	130	10	1,508
NCT12a	669	129	411	3	1,212	NCT12a	178	81	316	1	576
NCT13	0	2	7	0	9	NCT13	0	2	3	0	5
Total Codes Applied	6,835	4,234	16,541	2,113	29,723	Total Codes Applied	3,151	3,043	13,301	1,564	21,059

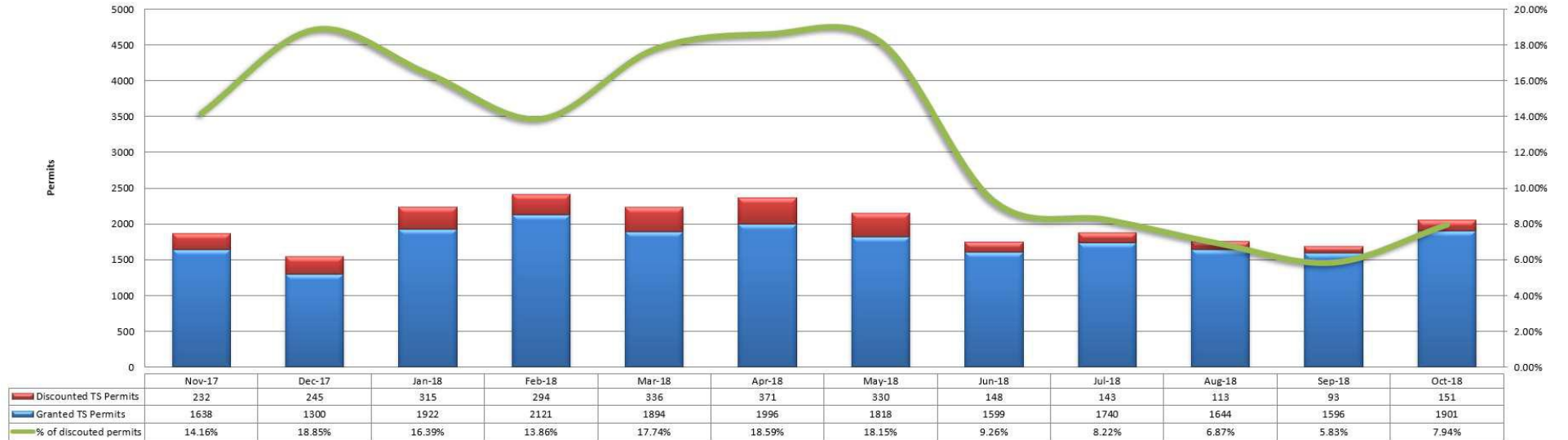


Analysis

Whilst the data gives an indicative picture of volumes and percentages of conditions, there is no measure of how the application of conditions has delivered benefits. Section 8 provides a more meaningful insight into the application, and benefits, of conditions.

Description

The volume of granted permits on TS streets, and the volume and percentage qualifying for a discount on the permit fee is shown for year 6.



Analysis

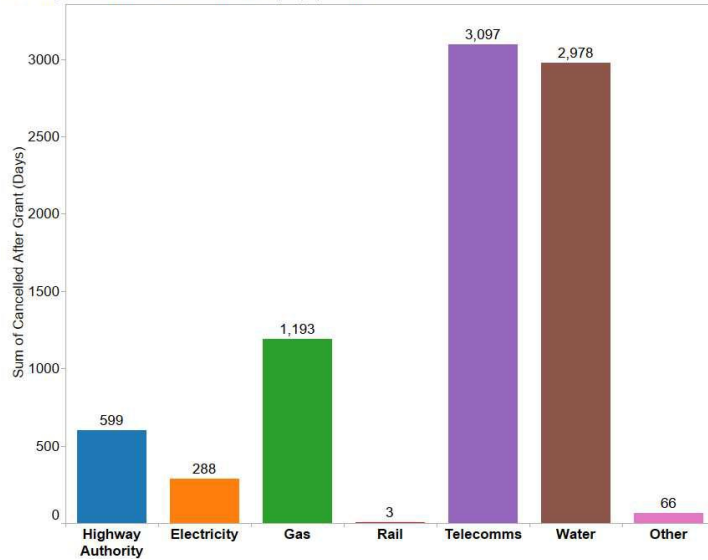
As shown in the data, percentage qualifying for a discount on the permit fee varies widely. This is not helped by the difficulty in identifying applicable works due to constraints imposed by EToN systems. It is hoped that the introduction of “Street Manager” will address this issue.

Description

The % of cancellation notifications received in time or not in time is shown by works type and promotor type for year 6. 'In time' is before works are due to start on site, 'not in time' is on or after the agreed works start date.

		Highway Authority	Electricity	Gas	Rail	Telecomms	Water	Other	Total
Major	In Time	67.52%	73.53%	78.74%	69.57%	78.82%	89.92%	52.00%	77.01%
	Not in Time	32.48%	26.47%	21.26%	30.43%	21.18%	10.08%	48.00%	22.99%
Standard	In Time	63.00%	49.10%	49.76%	100.00%	66.25%	66.85%	66.67%	59.66%
	Not in Time	37.00%	50.90%	50.24%		33.75%	33.15%	33.33%	40.34%
Minor	In Time	43.15%	31.82%	25.52%	93.94%	39.94%	31.66%	46.88%	37.24%
	Not in Time	56.85%	68.18%	74.48%	6.06%	60.06%	68.34%	53.13%	62.76%

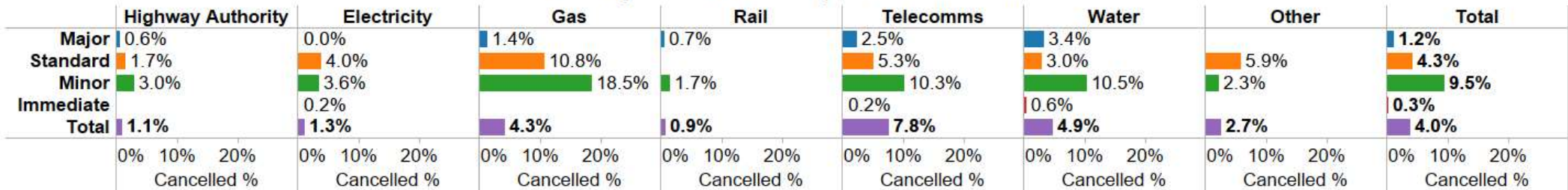
Roadspace Granted then Cancelled (days)-Year 6



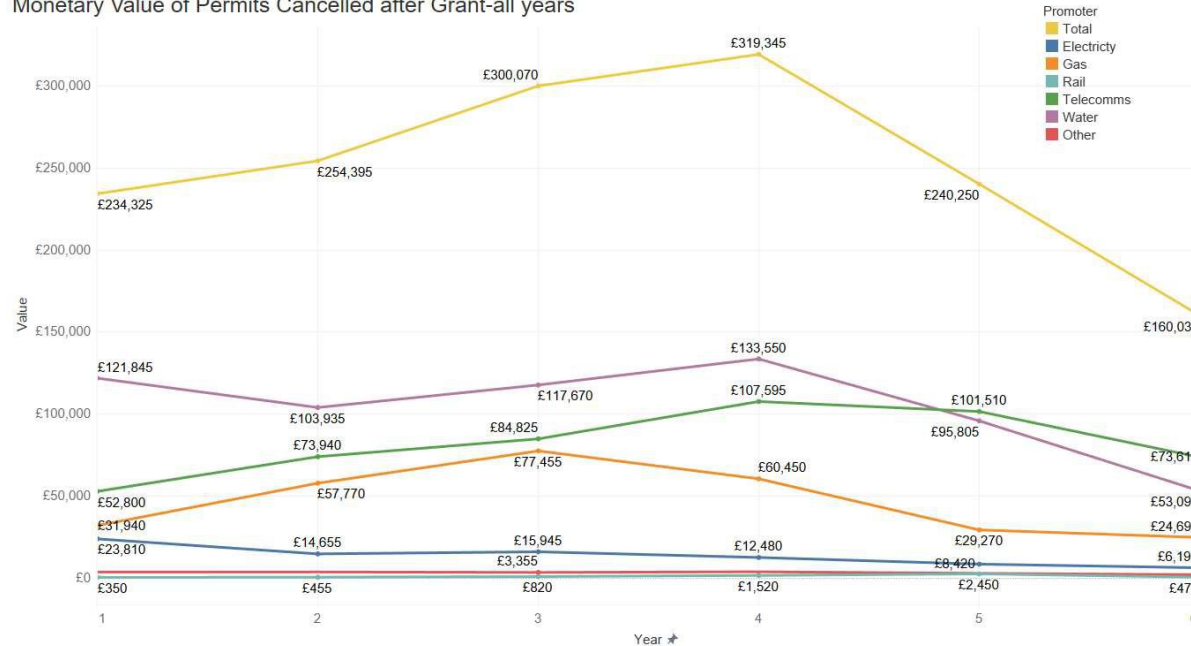
Monetary Value of Granted Permit Fees for Roadspace Granted then Cancelled-Year 6

	Electricity	Gas	Rail	Telecomms	Water	Other	Total
Major	£345	£3,285	£345	£2,175	£2,955	£0	£9,105
Standard	£4,320	£11,880	£0	£4,725	£1,770	£1,190	£23,885
Minor	£1,230	£9,530	£130	£66,570	£45,585	£780	£123,825
Immediate	£300	£0	£0	£140	£2,780		£3,220
Total	£6,195	£24,695	£475	£73,610	£53,090	£1,970	£160,035

Percentage of Granted Roadspace Cancelled-Year 6



Monetary Value of Permits Cancelled after Grant-all years



Monetary Value of Permits Cancelled after Grant-all years

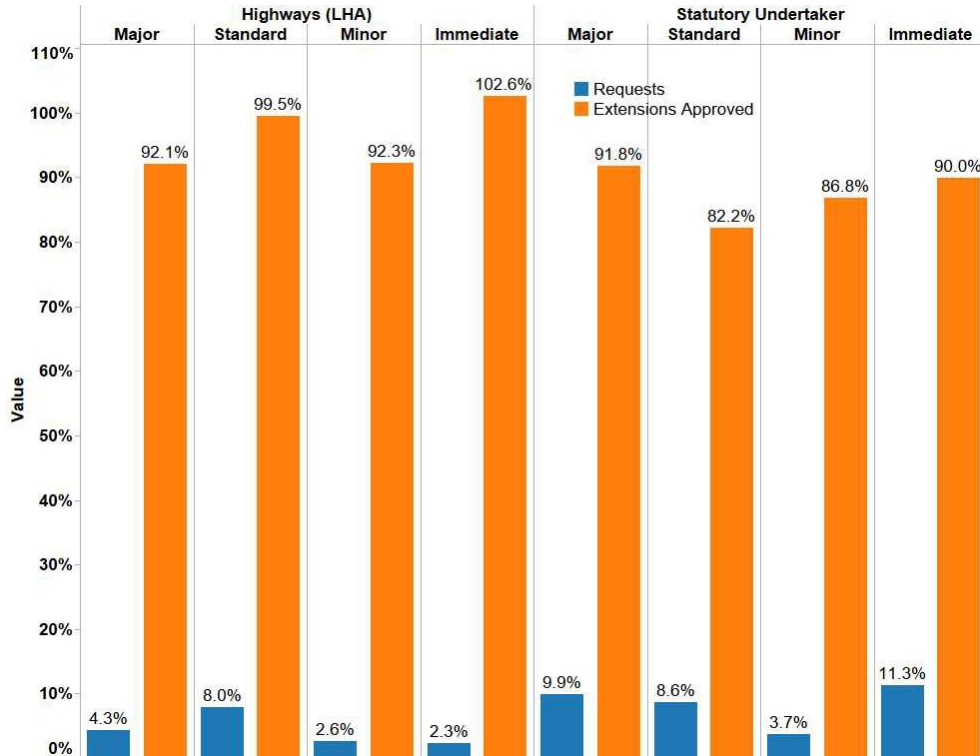
	Electricity	Gas	Rail	Telecomms	Water	Other	Total
1	£23,810	£31,940	£350	£52,800	£121,845	£3,580	£234,325
2	£14,655	£57,770	£455	£73,940	£103,935	£3,640	£254,395
3	£15,945	£77,455	£820	£84,825	£117,670	£3,355	£300,070
4	£12,480	£60,450	£1,520	£107,595	£133,550	£3,750	£319,345
5	£8,420	£29,270	£2,450	£101,510	£95,805	£2,795	£240,250
6	£6,195	£24,695	£475	£73,610	£53,090	£1,970	£160,035
Total	£81,505	£281,680	£6,070	£494,280	£625,895	£19,090	£1,508,420

Analysis

Whilst the notification of cancelled road space is not part of the permit scheme, this data indicates a lack of planning and affects the authority's abilities to coordinate works. It is included to demonstrate the late notification of cancellations and the monetary value of granted permits that are then subject to cancellation. HCC has repeatedly shared this data with the Statutory Undertakers throughout year 6, and whilst there has been a 33% reduction compared to year 5, the sum of £160,035 wasted money in permit fees is still considerable.

PSPI-11 Works Extensions and Duration Variation Applications

The graph displays the % of works, by works type and promoter group, that had an extension request and the percentage of those requests that were approved for year 6.



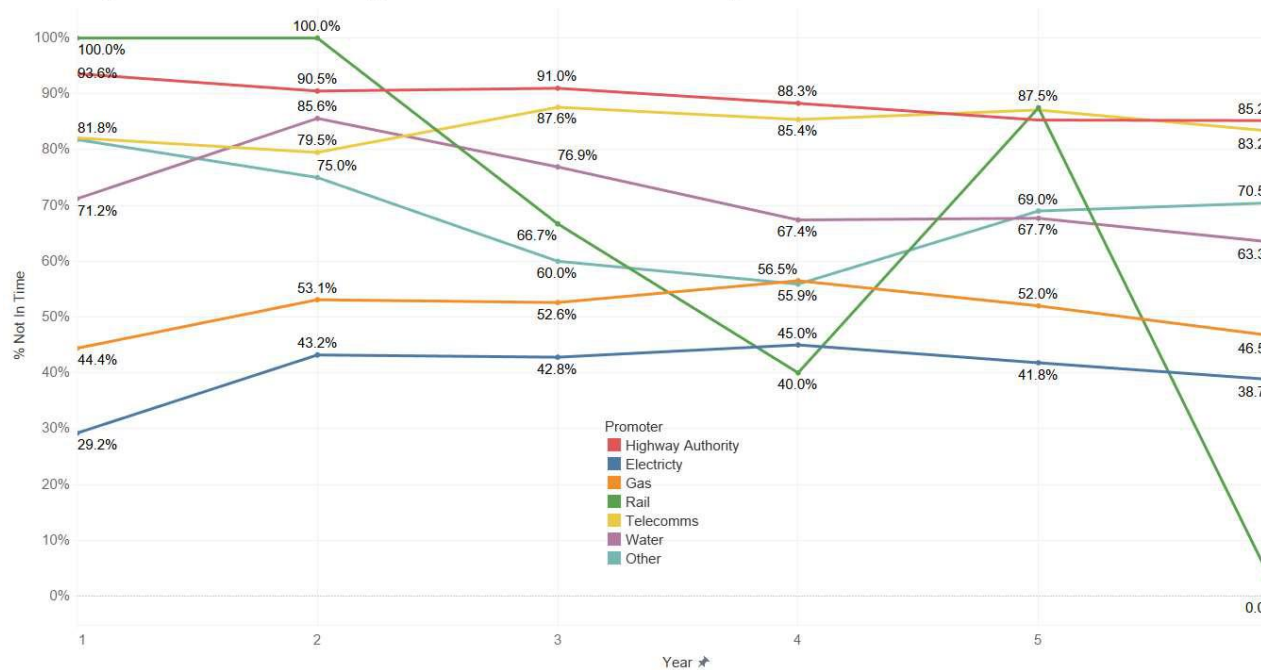
% of Granted Works with a Duration Request & % Approved-all years

		Y1		Y2		Y3		Y4		Y5		Y6	
		Requests of Granted Works (%)	Extensions Approved (%)	Requests of Granted Works (%)	Extensions Approved (%)	Requests of Granted Works (%)	Extensions Approved (%)	Requests of Granted Works (%)	Extensions Approved (%)	Requests of Granted Works (%)	Extensions Approved (%)	Requests of Granted Works (%)	Extensions Approved (%)
Highways (LHA)	Major	32.8%	86.0%	26.6%	77.1%	22.5%	86.1%	16.6%	88.6%	4.1%	83.9%	4.3%	92.1%
	Standard	11.2%	72.8%	14.5%	64.7%	13.1%	98.6%	13.7%	81.5%	6.8%	87.6%	8.0%	99.5%
	Minor	1.9%	73.7%	5.4%	81.0%	8.3%	90.0%	4.9%	85.3%	3.6%	84.1%	2.6%	92.3%
	Immediate	7.7%	90.1%	6.8%	77.3%	6.6%	93.8%	18.5%	92.4%	3.6%	92.6%	2.3%	100.0%
Statutory Undertakers	Major	36.2%	84.6%	48.5%	77.0%	60.6%	91.2%	41.0%	94.0%	6.5%	72.1%	9.9%	91.8%
	Standard	13.9%	75.6%	12.8%	85.9%	19.5%	82.7%	18.6%	91.2%	7.3%	82.4%	8.6%	82.2%
	Minor	2.0%	76.5%	2.3%	89.2%	2.1%	95.3%	2.4%	94.3%	2.4%	86.2%	3.7%	86.8%
	Immediate	15.9%	91.4%	12.8%	89.2%	13.0%	85.9%	11.0%	88.0%	9.8%	86.9%	11.3%	90.0%

The table shows the percentage of Duration Variation Applications received 'in time' or 'not in time' by works type and promoter type for year 6

		Highway Authority	Electricity	Gas	Rail	Telecomms	Water	Other	Total
		Major	In Time	33.9%	22.7%	43.8%	100.0%	40.6%	55.7%
Major	Not in Time	66.1%	77.3%	56.2%		59.4%	44.3%	82.4%	59.9%
Standard	In Time	29.6%	57.1%	50.5%		31.3%	55.2%	38.5%	42.0%
	Not in Time	70.4%	42.9%	49.5%		68.8%	44.8%	61.5%	58.0%
Minor	In Time	5.2%	16.7%	21.4%		5.6%	17.7%		12.0%
	Not in Time	94.8%	83.3%	78.6%		94.4%	82.3%	100.0%	88.0%
Immediate	In Time	3.1%	69.5%	60.2%		11.6%	40.3%		38.0%
	Not in Time	96.9%	30.5%	39.8%		88.4%	59.7%		62.0%

Percentage of Duration Variation Application received Not in Time-all years



Analysis

The overall percentage of works with an extension remains at an acceptable level. Whilst recognising there will be a small percentage of works that will have unforeseen circumstances that prevent an extension request being submitted within the minimum time, the percentages of duration variation requests received ‘not in time’ remains at an unacceptably high level. The Authority has repeatedly raised this issue with Works Promoters. there has been no significant reduction in the percentage of late submission of duration requests. Statutory Undertakers were advised that as from 1st November 2018 (start of year 7), the Network Management Operations Team will be refusing all duration extension requests, on planned works, that are submitted late.

PSPI-12 Authority Imposed Variations and Revoked Permits

Description

The volume of Authority Imposed Variations and Revoked permits is displayed by works type and promoter type for year 6.

		Highway Authority	Electricity	Gas	Rail	Telecomms	Water	Other	Total
Major	Authority Imposed Variation	62	15	27	2	33	29	7	175
	Revoke Permit	12		18	2	21	7		60
Standard	Authority Imposed Variation	33	37	27	1	23	17	2	140
	Revoke Permit	5	11	6		16	8	1	47
Minor	Authority Imposed Variation	45	10	12	2	97	81	5	252
	Revoke Permit	14	1	1		41	19	1	77
Immediate	Authority Imposed Variation	426	619	455		265	1,425	1	3,191
	Revoke Permit	3	2	7		1	6		19
Total		600	695	553	7	497	1,592	17	3,961

Analysis

The volumes show an increase of 51% from year 5. This is almost entirely due to an increase of Authority Imposed Variations on Immediate works.

Description

A specific year 6 action was to try and reduce the volume of works data variations submitted against AIVs on immediate works. The HAUC Guidance for the Operation of Permit Schemes states that there is no requirement to respond to these AIVs unless there is an issue. Some promoters have embraced this, greatly reducing unnecessary administration, however other promoters are still submitting high volumes of WDV in response to AIVs on immediate permits. The data also includes an indicative time value of 5 minutes per transaction – for both the Works Promoter submitting an unnecessary data variation and for the Authority response to this variation.

Response to AIVs by Promoter - Volume

		Jan-18	Feb-18	Mar-18	Apr-18	May-18	Jun-18	Jul-18	Aug-18	Sep-18	Oct-18	Total
Affinity	No	42	28	45	24	27	23	41	61	31	54	376
Water	Yes	36	45	48	35	31	32	66	79	49	84	505
BT	No	11	13	18	6	9	23	28	20	2	17	147
	Yes	3	2	1		5	7	5	2	4	9	38
Cadent	No	16	19	21	10	9	14	15	19	8	35	168
Gas	Yes	29	13	24	12	11	11	10	9	6	21	146
Thames	No	20	15	10	13	14	18	10	19	16	32	167
Water	Yes	10	11	9	3	5	5	9	11	7	13	83
UK Power	No	28	16	20	16	7	20	15	8	9	8	133
	Yes	32	23	45	21	23	29	42	34	29	43	321
Virgin	No	2	2	1	1	1	1	1	1	1	1	14
Media	Yes		2		1			1	1	1		6
Others	No	1	1					1	1		1	6
	Yes	1	1				1				1	4

Response to AIVs by Promoter - % of issued

		Jan-18	Feb-18	Mar-18	Apr-18	May-18	Jun-18	Jul-18	Aug-18	Sep-18	Oct-18	Total
Affinity	No	54%	38%	48%	41%	47%	42%	38%	44%	39%	39%	43%
Water	Yes	46%	62%	52%	59%	53%	58%	62%	56%	61%	61%	57%
BT	No	7%	9%	12%	4%	6%	15%	19%	13%	3%	11%	10%
	Yes	21%	13%	5%		36%	23%	15%	9%	67%	35%	21%
Cadent	No	10%	12%	13%	6%	7%	11%	11%	12%	5%	19%	12%
Gas	Yes	64%	41%	53%	55%	55%	44%	40%	32%	43%	38%	47%
Thames	No	6%	9%	5%	8%	7%	11%	5%	11%	10%	14%	6%
Water	Yes	33%	42%	47%	19%	26%	22%	47%	37%	30%	29%	33%
UK Power	No	18%	11%	11%	13%	10%	11%	11%	12%	12%	10%	11%
	Yes	52%	59%	69%	57%	77%	59%	74%	81%	88%	84%	69%
Virgin	No	100%	57%		50%		100%		80%		50%	70%
Media	Yes		33%		50%				20%	100%	50%	30%
Others	No	50%	30%		100%				100%		50%	56%
	Yes	50%	50%				100%				50%	44%

Estimated Time Value (hours) for Issuing OR Responding to Works Data Variations

		Jan-18	Feb-18	Mar-18	Apr-18	May-18	Jun-18	Jul-18	Aug-18	Sep-18	Oct-18	Total	
Affinity	Water	Yes	3.00	3.75	4.00	2.92	2.58	2.67	5.50	6.58	4.08	7.00	42
BT	Yes	0.25	0.17	0.08		0.42	0.58	0.42	0.17	0.33	0.75	3	
Cadent	Gas	Yes	2.42	1.08	2.00	1.00	0.92	0.92	0.83	0.75	0.50	1.75	12
Others	Yes	0.08	0.08				0.08					0.08	0
Thames	Water	Yes	0.83	0.92	0.75	0.25	0.42	0.42	0.75	0.92	0.58	1.08	7
UK Power	Yes	2.67	1.92	3.75	1.75	1.92	2.42	3.50	2.83	2.42	3.58	27	
Virgin	Media	Yes		0.17		0.08			0.08	0.08	0.08	0	
Total			9	8	11	6	6	7	11	11	8	14	92

Analysis

This data has been shared at quarterly co-ordination meetings throughout year 6 with an expectation that responses to AIVs on Immediate Works would drop significantly. As can be seen from the data, this has only had limited effect. Given the time, and therefore cost, of this unnecessary process, Works Promoters are urged to reduce this unnecessary administrative burden.

Description

The average duration of works, throughout their lifecycle, is shown by works type and promoter type for year 6. Duration is derived from the estimated or actual start and stop dates within the EToN transaction types. Days are calendar days.

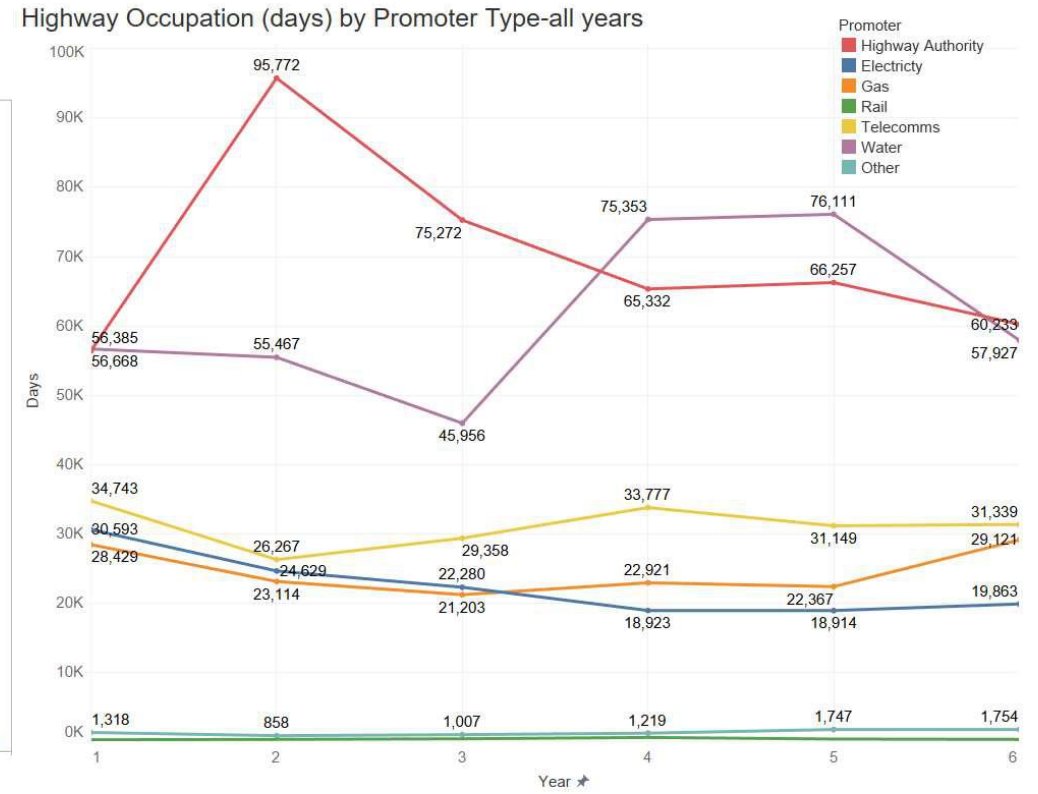
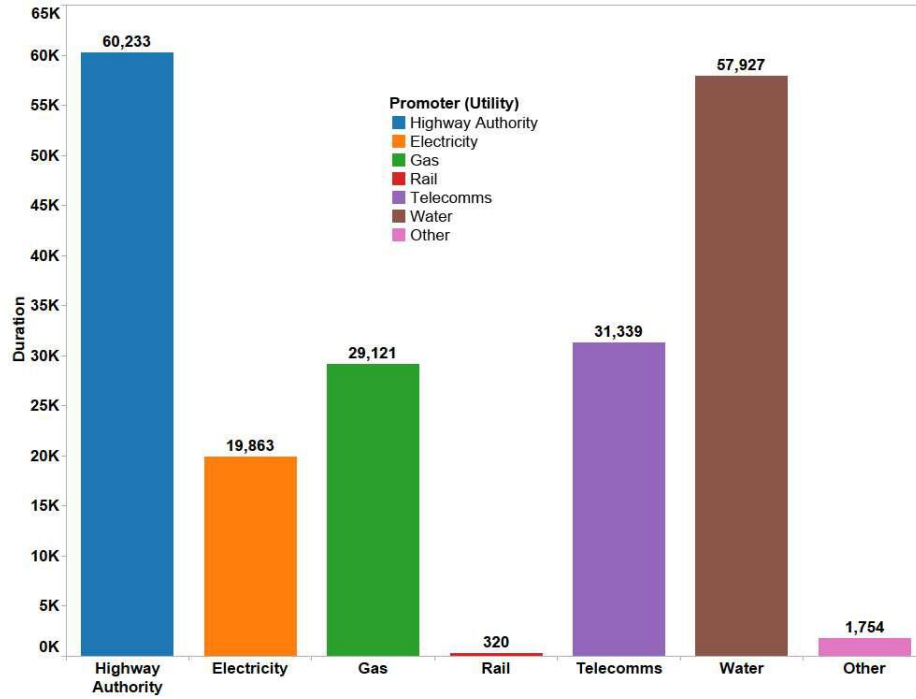
		Highway Authority	Electricity	Gas	Rail	Telecomms	Water	Other	Average
Major	PAA	11.4	13.0	30.3	4.7	10.1	17.0	21.5	14.5
	Grant PAA	11.5	13.6	30.1	3.0	8.5	17.6	24.9	14.1
	Grant Permit	8.2	11.4	28.4	2.3	9.1	16.8	23.8	11.2
	Actual Start Date	7.5	11.8	29.3	2.2	8.7	17.4	21.2	10.9
	Works Stop	7.5	14.1	36.9	2.2	9.6	19.9	18.1	11.9
Standard	Standard	7.4	7.4	7.3	7.3	9.8	10.3	8.8	8.1
	Grant Permit	7.3	7.2	7.4	7.9	9.7	10.3	8.4	7.9
	Actual Start Date	7.3	7.2	7.4	6.8	9.8	10.1	8.2	8.0
	Works Stop	6.8	6.9	7.9	6.1	9.0	10.5	9.2	7.8
Minor	Minor	2.4	3.1	3.3	1.7	3.1	3.6	2.5	3.2
	Grant Permit	2.4	3.1	3.2	1.6	3.1	3.6	2.5	3.1
	Actual Start Date	2.6	3.2	3.1	1.6	3.1	3.5	2.4	3.2
	Works Stop	2.4	2.8	2.8	1.5	2.7	3.2	2.3	2.8
Immediate	Immediate	3.0	6.6	8.5	1.2	3.6	4.5	2.1	3.9
	Grant Permit	2.6	6.7	8.5	1.5	3.6	4.7	2.5	4.5
	Works Stop	1.6	5.3	9.3	1.0	3.0	4.6	2.4	2.9

Analysis

The variation in duration for Highways major works is explained by local process for phased works. Average durations are broadly in line with AHAUC durations for works.

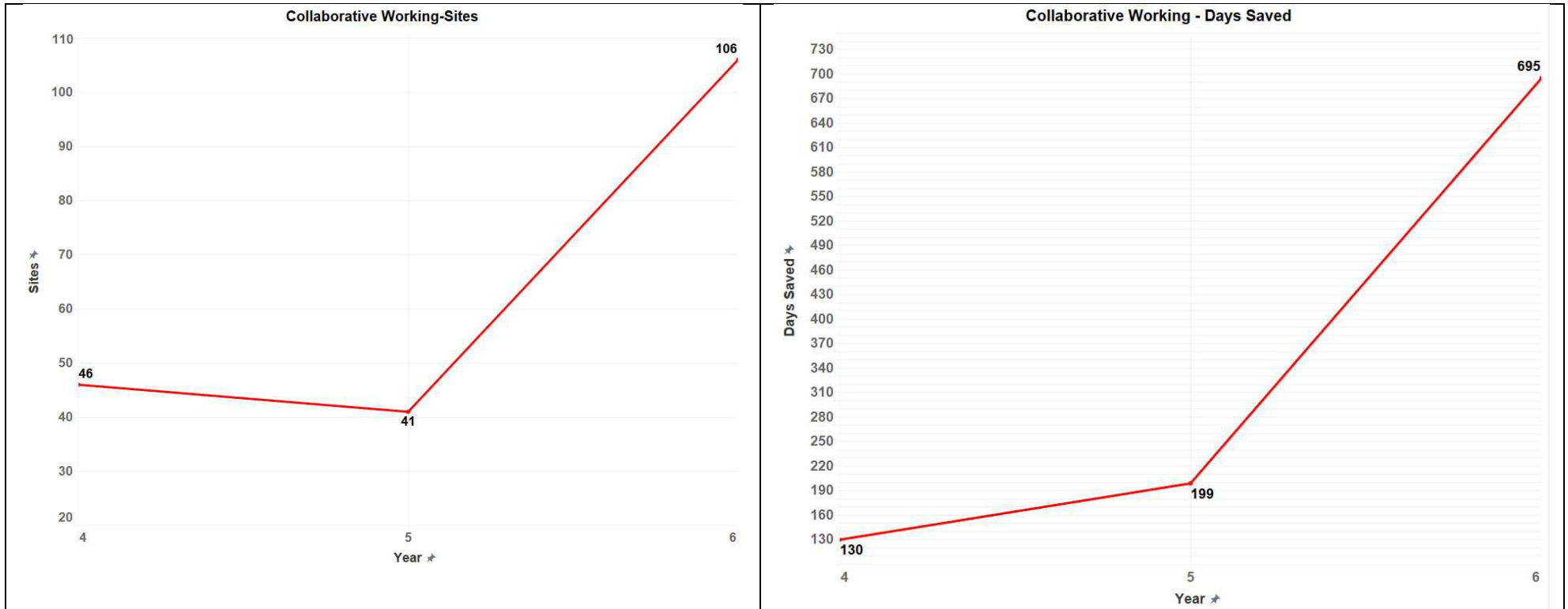
Description

The highway occupation (days) by promoter type for year 6 (based on completed works). Days are calendar days i.e. all occupation of the network.



Description

The number of sites and days saved from collaborative or contiguous working.



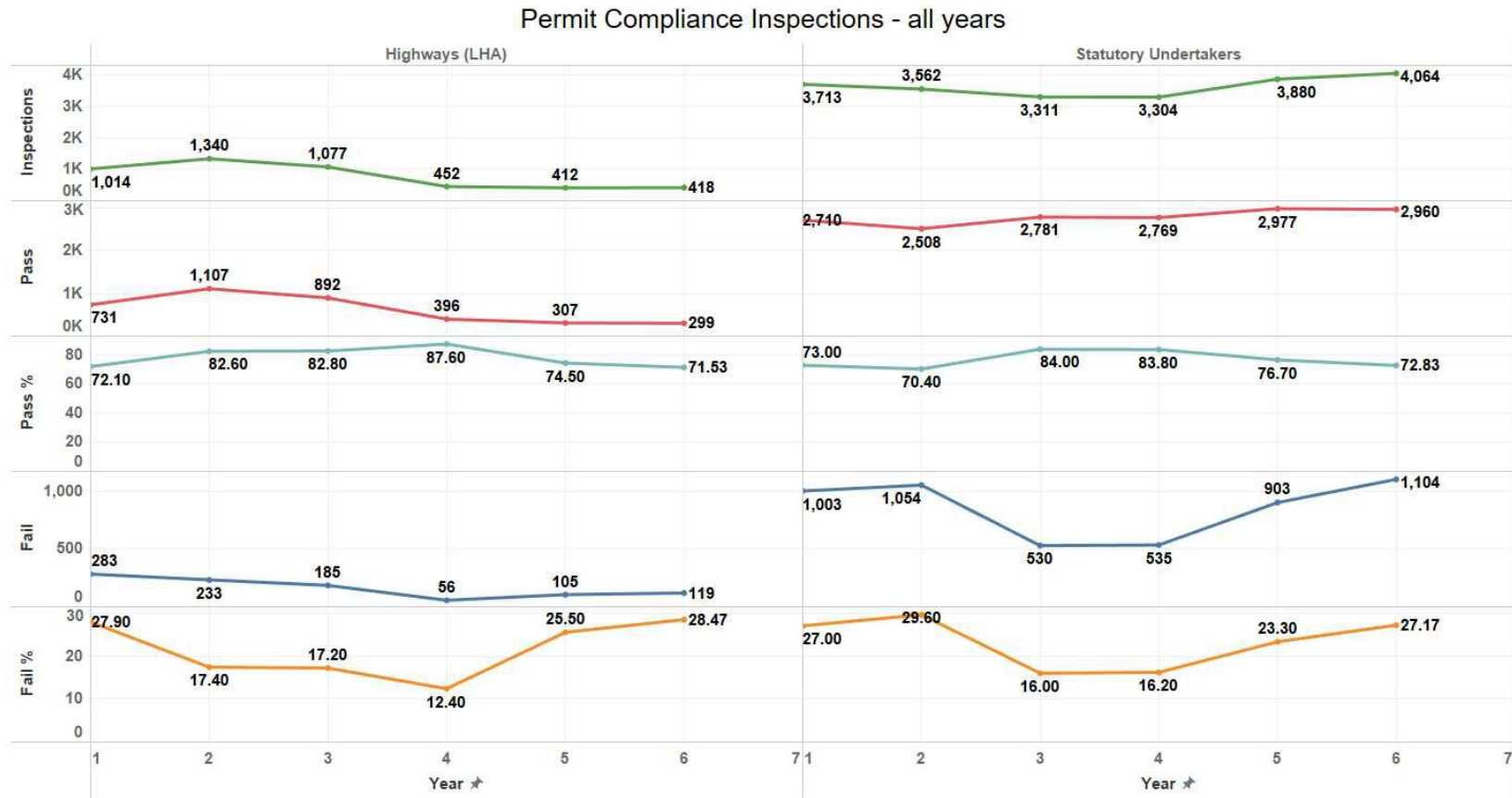
Analysis

The significant increase in collaborative working is wholly due to efforts of the Network Management Operations Team and the introduction of an improved recording process, although this process remains wholly outside of EToN due to the inability of systems to correctly record and report on collaborative working.

PSPI-16 Permit Compliance Inspections

Description

The number of inspections, numbers passed and fail and % pass and fail of Permit Compliance Inspections is shown by Promoter group and year.



Analysis

Volumes of inspection and % pass and fail rates remain broadly consistent. Plans continue to be formulated to increase the number of NRSWA specific inspections for HCC Framework sites, subject to contractual constraints.

PSPI-17 Fixed Penalty Notices (Permit Scheme)

Description

The reasons for Fixed Penalty Notices (PS01 - Working Without a Permit and PS02 - Working in Breach of Conditions) for all Works Promoters

	Year			Total
	4	5	6	
Working Without a Permit	111	109	128	348
Footway	9	11	5	25
Incorrect or No Permit Number Displayed	260	343	392	995
Methodology	1	3	14	18
Number of Records	1	1	1	3
Publicity		2	3	5
Storage		3		3
Traffic Management	153	310	490	953
Working Past End Date	89	118	111	318
Working in TS Times	28	25	15	68
Total	651	924	1,158	2,733

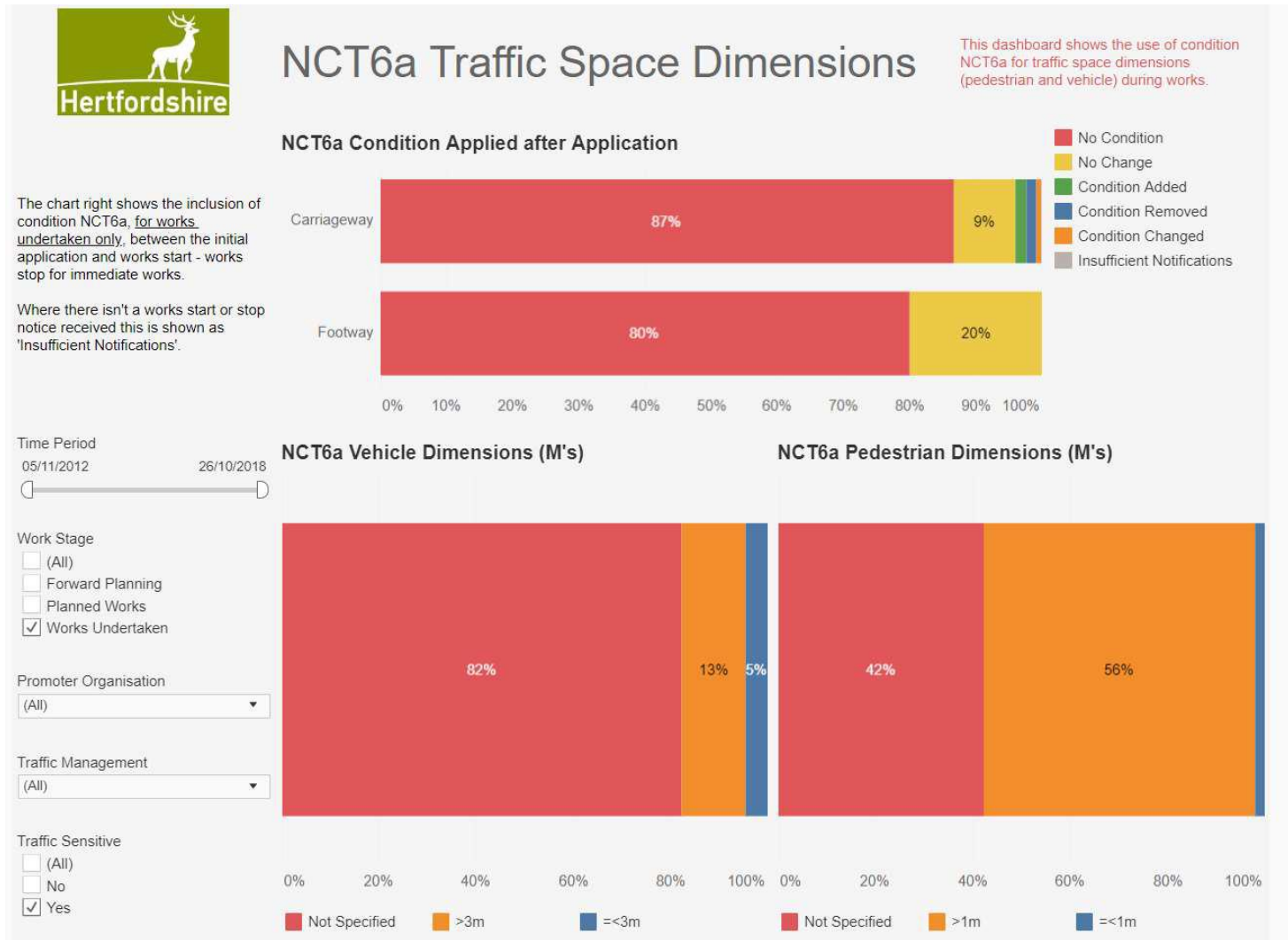
Analysis

Instances of 'incorrect or no permit number displayed' and 'traffic management' issues accounted for 76% of FPNs issued.

8-Demonstrating added value of Conditions

Description

The capability to analyse text strings for conditions and responses provides a powerful tool to enable the measurement and effect of the application of conditions. In particular, the added value that the coordination team provide that a permit scheme allows, as opposed to operating under a noticing regime. The charts below provide some examples of the outcomes. We will build on this during year 7.





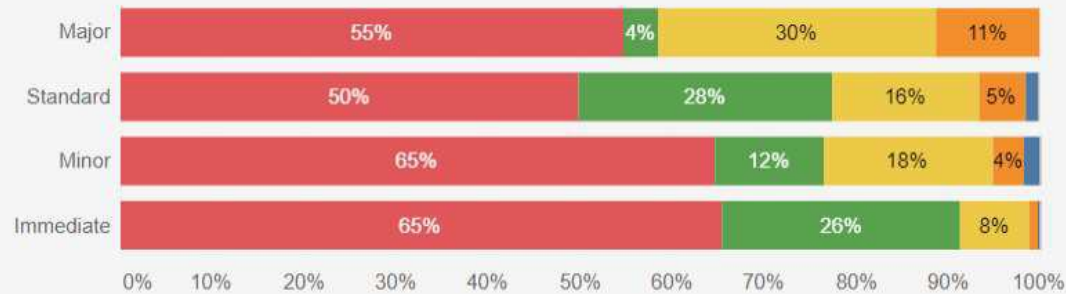
NCT8b Manual Control of TM

This dashboard shows the use of condition NCT8b for manual control of traffic management. Only works with the traffic management categories of (1) multi-way signals and (2) two-way signals are included in this dashboard.

The chart right shows the inclusion of condition NCT8b, for works undertaken only, between the initial application and works start - works stop for immediate works.

Where there isn't a works start or stop notice received this is shown as 'Insufficient Notifications'.

NCT8b Condition Applied after Application



Time Period
05/11/2012 26/10/2018

Promoter Organisation
(All)

NCT8b Inclusion of Condition over Time



Work Stage

- (All)
- Forward Planning
- Planned Works
- Works Undertaken

Work Category

- (All)
- Immediate
- Major
- Minor
- Standard

Traffic Sensitive

- (All)
- No
- Yes

NCT8b Time Parameters Applied

NCT8b_Time_Value	% of Total	Count
Not Specified	58.86%	973.0
0700-0930 1600-1830	12.64%	209.0
0930-1600	6.29%	104.0
0600-2000	4.72%	78.0
0930-1530	3.21%	53.0
0700-0930 1600-1900	1.39%	23.0
0700-0930 1500-1830	1.33%	22.0
0930-1600 1830	1.15%	19.0
0700-0930	0.73%	12.0
0700-1900	0.67%	11.0
0700-0930 1600-1800	0.54%	9.0
0700-1830	0.48%	8.0
0700-2000	0.48%	8.0

NCT8b Applied by Traffic Management





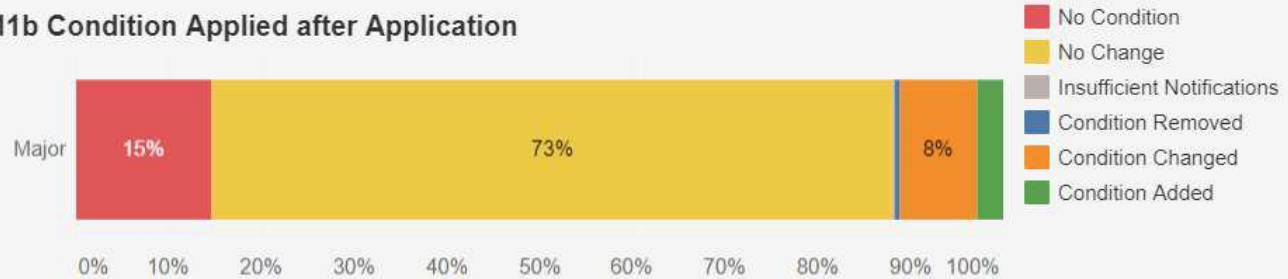
NCT11b Communication Analysis

This dashboard shows the use of condition NCT11b for the prior communication of works and engagement with affected parties.

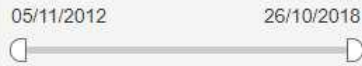
The chart right shows the inclusion of condition NCT11b, for works undertaken only, between the initial application and works start - works stop for immediate works.

Where there isn't a works start or stop notice received this is shown as 'Insufficient Notifications'.

NCT11b Condition Applied after Application



Time Period



Work Stage

- (All)
- Forward Planning
- Planned Works
- Works Undertaken

Promoter Organisation

(All)

Traffic Management

(All)

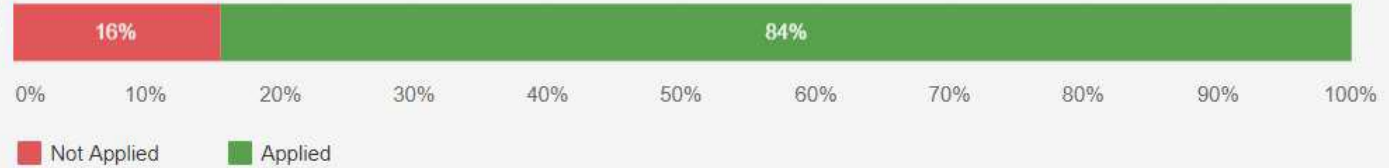
Work Category

- (All)
- Immediate
- Major
- Minor
- Standard

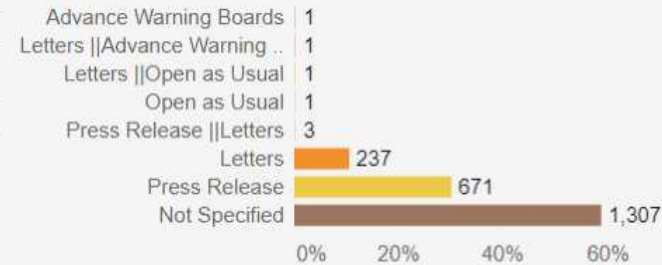
Traffic Sensitive

- (All)
- No
- Yes

Condition Applied



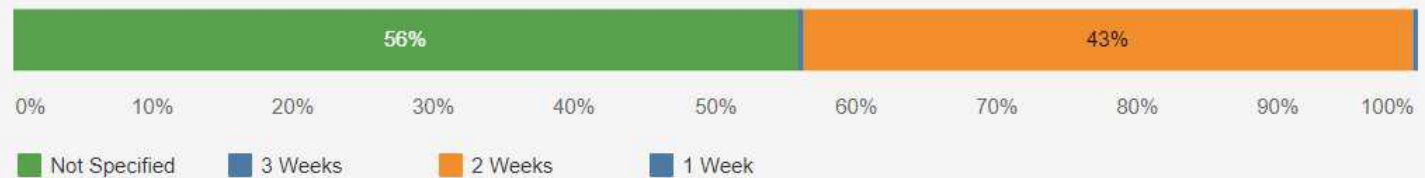
Communication Analysis



Consultee Analysis



Letters Lead Time



9-Demonstrating Economic Impact of Coordination

Description

The chart below demonstrate the economic impact of works where impact costs have been applied to the works at 'application' and 'grant' stages. It is assumed that the decrease in impact between application and grant is due to positive coordination by the Network Management team e.g. application of conditions, changes in timing of works or changes to traffic management. This positive coordination, and its resulting benefits, is a clear demonstration of the benefits of operating within a permit scheme.

Works Impact Costs £s

