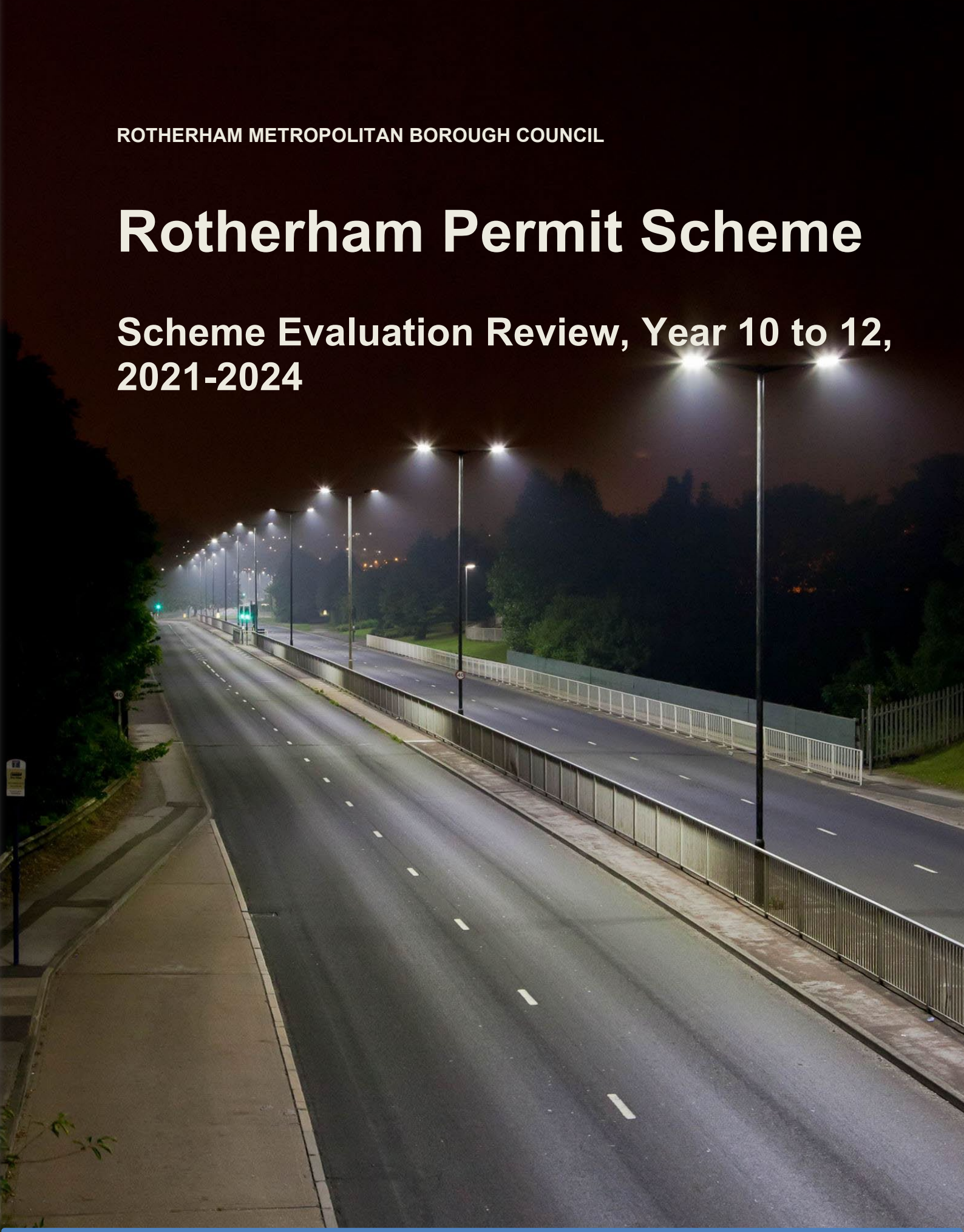
ROTHERHAM METROPOLITAN BOROUGH COUNCIL

# Rotherham Permit Scheme

## Scheme Evaluation Review, Year 10 to 12, 2021-2024



Big Hearts Big Changes

Rotherham Metropolitan Borough Council

# 1 INTRODUCTION

## 1.1 Background

1.1.1 The Rotherham Borough Council Permit Scheme went live on 12th June 2012.

1.1.2 The scheme operated within the common permit scheme known as the *'Yorkshire Common Permit Scheme for Road Works and Street Works'*. Yorkshire highway authorities participated in the creation of the common scheme (YCPS) for the Yorkshire Highways and Utilities Committee (YHAUC) area.

1.1.3 The scheme operated under the powers of the Traffic Management Act 2004 (TMA) and was introduced to help the Permit Authority to better manage their highway network, as well as minimising disruption caused by utility company street works and the Council's own highway works.

1.1.4 The common permit scheme included all streets within the authority area which are:

- Reinstatement Category 0, 1 and 2 streets (as defined in NRSWA), or;
- Streets where any part of the length of street is designated as Traffic Sensitive.

1.1.5 A variation was introduced in 2015 with the *'The Traffic Management (Rotherham Borough Council) Permit Scheme Order 2015'.* The new order was introduced to confirm compliance with the amended permit scheme regulations as set out in the 'Traffic Management Permit Scheme (England) Regulations 2007 (as amended)' and the 'Traffic Management Permit Scheme (England) (Amendment) Regulations 2015'.

1.1.6 The Rotherham Borough Council Permit Scheme came into effect on the 1st October 2015.

1.1.7 The scheme was later extended to include Non-Traffic Sensitive category 3 and 4 streets within the Council area. Following an extensive review and consultation period, the revised scheme came into effect on 12th March 2020.

## 1.2 Previous reviews

1.2.1 In line with the permit scheme regulations, annual reviews were carried out for the first three years of the scheme. The reviews were carried out jointly within the YCPS with data specific to each authority included in the appendices.

1.2.2 The following YCPS reviews were carried out:

- *'Yorkshire Common Permit Scheme Annual Report, 2012 - 13'*
- *'Yorkshire Common Permit Scheme Annual Report, 2013 - 14'*
- *'Yorkshire Common Permit Scheme Annual Report, 2014 - 15'*

1.2.3 Following completion of annual reports for the first three years, the permit scheme regulations require a review be carried out and reported every three years thereafter. The first 3-year reviews was carried out by the Council and reported in:

- *'Rotherham Metropolitan Borough Council, Permit Scheme Evaluation, 2015 – 2018'*

1.2.4 GK-TC was commissioned in 2022 to carry out a full review of the scheme operation between 2018 and 2021. This review is reported in:

- *'Rotherham Permit Scheme, Scheme Evaluation Review, Years 7 to 9, 2018 – 2021'*

## 1.3 Year 10 to 12 review

1.3.1 This review covers the next three year period, 2021 to 2024, and includes a review of the permit scheme operation and a full review of permit income and operating costs since 2021.

# 2 SCHEME EVLAUTION 2021-24

## 2.1 Format of review

2.1.1 This report presents the results and conclusions of the third three-year review, covering the period 12th June 2021 to 11th June 2024. The report follows the structure and content of the Years 7 to 9 permit scheme review.

2.1.2 Previous reviews were carried out jointly within the YCPS common scheme with data specific to each authority included in the appendices. The YCPS reviews contain Key Parity Measures (KPM's) and Key Success Measures (KSM's). Detailed information and analysis on the KPM's and KSM's are set out in section 4 of this report.

## 2.2 Key Parity Measures (KPM's)

2.2.1 In the YCPS, permit authorities are also the highway authority, and the highway authority is a promoter of its own maintenance and other highway and traffic activities. Permit authorities need to separate these functions within their organisations and must demonstrate parity of treatment for all activity promoters, particularly between statutory undertakers and the highway authorities' own promoters. The aim of the KPM's is to ensure that permit authorities apply a consistent approach to all activities and activity promoters.

2.2.2 KPM's are drawn from Chapter 20 of the "Code of Practice for Permits", which sets out seven Key Performance Indicators (KPI's) that permit authorities can use to demonstrate parity of treatment. KPI's 1 and 2 are mandatory within all permit schemes, and then permit authorities must select at least two more KPI's on which to report.

2.2.3 There are five KPMs in the YCPS:

- **KPM1** – The number of permit and permit variations applications received, the number granted and the number refused.
- **KPM2** – The number of conditions applied by condition type.
- **KPM3** – The proportion of approved extensions.
- **KPM4** – The number of agreements to work in Section 58 and Section 58A restrictions.
- **KPM5** – The percentage of PAA, permits and applications cancelled.

## 2.3 Key Success Measures (KSM's)

2.3.1 Any activity carried out in the street has the potential to cause disruption. The introduction of the YCPS provides an opportunity to realise a number of benefits to road users, local residents and businesses in the permit areas through better control.

2.3.2 Permit authorities have established a series of measures that link to the scheme objectives and that are designed to track delivery of these anticipated benefits.

2.3.3 There are five measured KSM areas in the YCPS:

- **KSM1** – Minimising delay and reducing disruption to road users arising from street and road works activity.

- **KSM2** – Reduction in remedial measures.
- **KSM3** – Better information for road users.
- **KSM4** – Improved compliance with the "Safety at Street Works and Road Works Code of Practice".
- **KSM5** – Improved activity planning.

2.3.4 Many of the success measures are more subjective in nature so are difficult to quantify from the key performance and works occupancy statistics.

## 2.4 Intangible benefits

2.4.1 In addition to the measured benefits, the YCPS also anticipated a number of intangible, unmeasured benefits, including:

- The need to book road space and undertake the activity within a specified time period would focus attention on improved planning and activity scheduling by works promoters.
- Administrative improvements through more consistent consideration of factors relating to proposed activities would lead to improved certainty that the activity would take place as planned. Also, appropriate and correct information exchange would take place first time.
- Improved standards of information between activity promoters and permit authorities would lead to improved relationships, cooperative working and mutual support.
- Improved public perception of the way in which activities were planned and undertaken.

# 3 SCHEME OBJECTIVES

## 3.1 Key objective

3.1.1 The Key Objective for the Yorkshire Common Permit Scheme (Rotherham) is:

- Minimising delay and reducing disruption to road users arising from road and street works activity.

## 3.2 Parity objective

3.2.1 The Parity Objective for the scheme is:

- Ensuring parity between promoters of street works and works for road purposes.

## 3.3 Supplementary objectives

3.3.1 Supplementary Objectives for the scheme are:

- To protect the structure of the street and the integrity of apparatus in it;
- To encourage proactive, rather than reactive, attitudes to activities by promoters. It will be easier to reject a permit application for non-supply of required information than it will be to impose a directive on a Notice. This change in culture will result in the supply of more information to RBC, which will better enable it to manage the network, coordinate activities within the borough and across adjacent authorities, and reduce disruption to users of the highway. This information is provided to the general public enabling informed journey choices;
- To ensure safety for those using, living or working on the street, including those engaged in activities controlled by the Permit Scheme;
- To improve activity planning by all promoters;
- An aid to help improve public transport efficiencies.

## 3.4 Specific authority objectives

3.4.1 Specific Authority Objectives for the scheme are:

- To reduce the disruption caused by road and street works, which will assist in tackling delays and unpredictable journey times;
- To ensure best efforts in the co-ordination of road and street works and pro-actively encourage works at similar geographic locations by different promoters to be undertaken concurrently;
- To encourage innovative working practices by road and street works promoters, in order to reduce the requirement for both time and space hence reducing delays.

# 4 WORKS DURATION

## 4.1 Methodology

4.1.1 Data sources available for this review are:

- Permit Scheme works stopped notices, June 2021 – June 2024 (Symology database)
- KPI reports, June 2021 – June 2024 (Symology database)

4.1.2 This review assesses the year-on-year change in the number of Permit applications and review the breakdown of key performance metrics. The main purpose of this analysis is to quantify the benefit of the Permit Scheme in terms of a reduction in number of days worked on the road network.

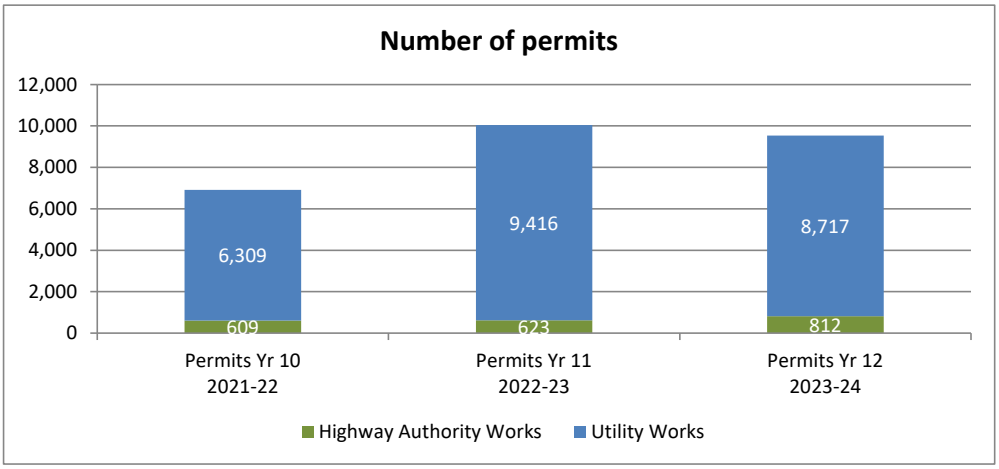
4.1.3 As well as comparing statistics between Years 10, 11 and 12, the average 3-year statistics are compared with the average for the previous 3-year period; Years 7, 8 and 9.

## 4.2 Number of permits

4.2.1 The following series of charts and tables present a comparison of the number of permits granted in each of the years considered in this 3-year period (Table 1).

**Table 1 Number of permits granted**

| PROMOTER TYPE | Permits Yr 10 2021-22 | Permits Yr 11 2022-23 | Permits Yr 12 2023-24 |
|---|---|---|---|
| Highway Authority Works | 609 | 623 | 812 |
| Utility Works | 6,309 | 9,416 | 8,717 |
| **Total** | **6,918** | **10,039** | **9,529** |




4.2.2 The scheme was extended to include all streets the authority has responsibility for in March 2020. This change is reflected in the increase in number of permits granted in Year 9.

4.2.3 The number of permits granted in Year 10 is very similar to the previous year, with 6,309 permits for utility works granted compared with 6,432 in the first full year operating across all streets.

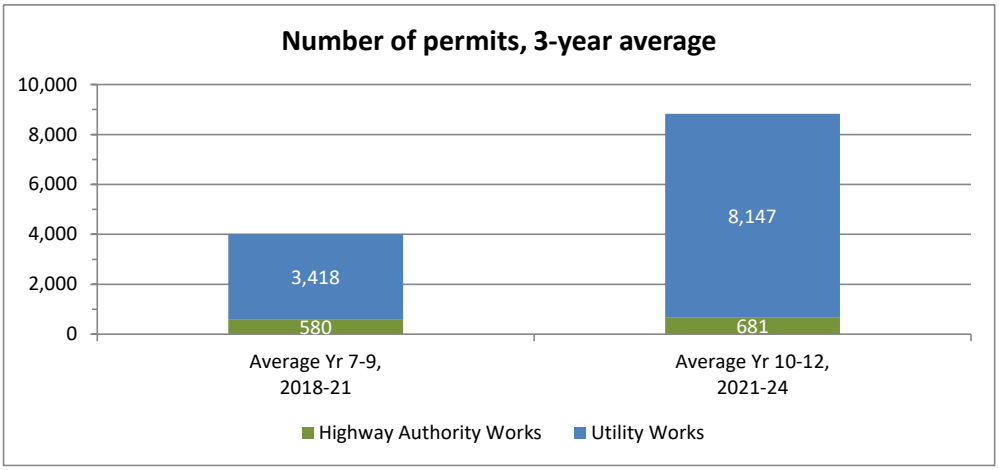
4.2.4 The number of permits has increased significantly during the last two years, from an average of 6,371 in Years 9 and 10, to 9,416 and 8,717 in Years 11 and 12. This represents an average 42% increase in permit activity in the last two years.

4.2.5 The first full year of operation for the extended scheme in Year 9, recorded a more than threefold increase in the number of permits granted. Therefore, the resource required to process permit applications has increased significantly over the last four years.

4.2.6 A comparison of the average number of permits granted in the last three years and the previous three-year period is shown in Table 2.

**Table 2 Number of permits, change from Years 7 to 9 (3-year average)**

| PROMOTER TYPE | Average Yr 7-9, 2018-21 | Average Yr 10-12, 2021-24 | Difference |
|---|---|---|---|
| Highway Authority Works | 580 | 681 | 101 |
| Utility Works | 3,418 | 8,147 | 4,729 |
| **Total** | **3,999** | **8,829** | **4,830** |




4.2.7 The large increase in the three-year average is a result in the extension of the scheme at the end of Year 8, half way through the last three year period.

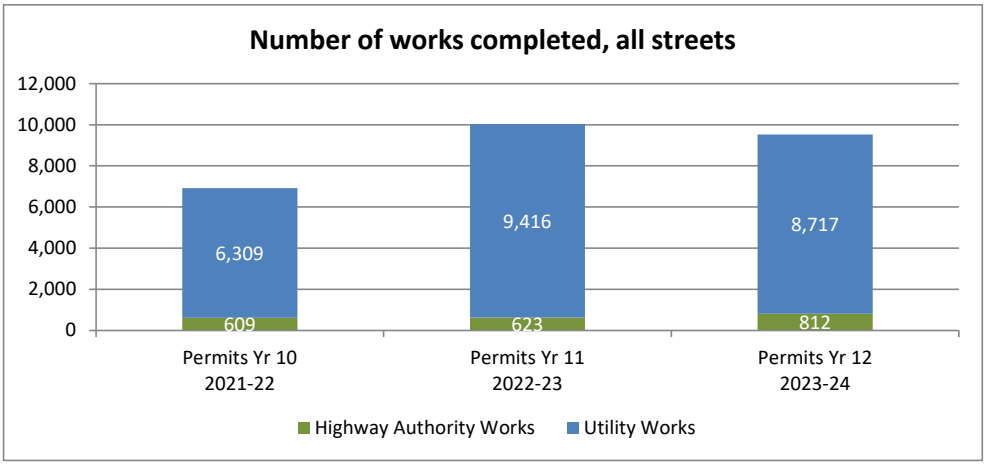
## 4.3 Number of works completed

4.3.1 The following tables present the number of works completed across the network. Th e Year 7 to 9 average data includes both permits and notices outside of the scheme before the extension in March 2020.

4.3.2 The number of works completed and a breakdown by highway authority and utility company is shown in Table 3 and the accompanying chart.

**Table 3 Number of works stopped records**

| PROMOTER TYPE | Permits Yr 10 2021-22 | Permits Yr 11 2022-23 | Permits Yr 12 2023-24 |
|---|---|---|---|
| Highway Authority Works | 609 | 623 | 812 |
| Utility Works | 6,309 | 9,416 | 8,717 |
| **Total** | **6,918** | **10,039** | **9,529** |

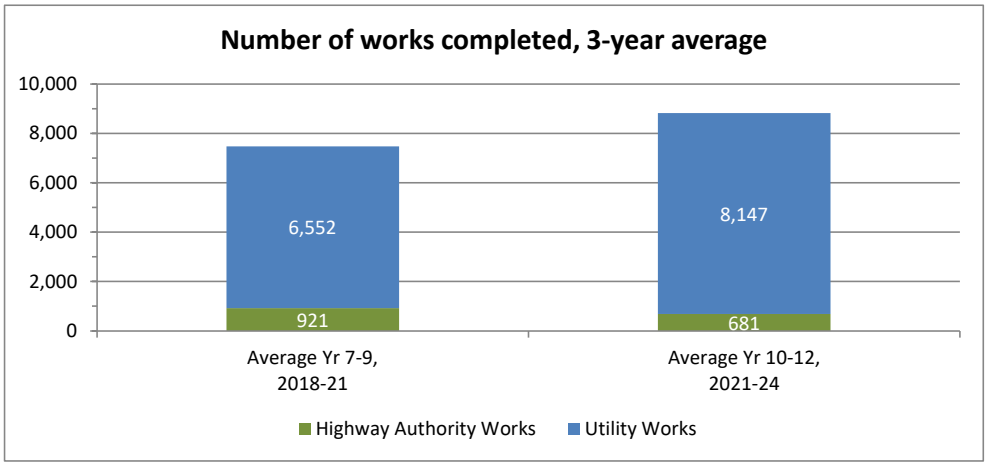



4.3.3 The number of highway permits has been consistent at between 600 and 800 over the last three years.

4.3.4 The highest number of works completed was in Year 11. While the number of works completed last year has reduced, it is still significantly higher than the number of works completed in all previous years.

**Table 4 Number of works, change from Years 7 to 9 (3-year average)**

| PROMOTER TYPE | Average Yr 7-9, 2018-21 | Average Yr 10-12, 2021-24 | Difference |
|---|---|---|---|
| Highway Authority Works | 921 | 681 | -239 |
| Utility Works | 6,552 | 8,147 | 1,595 |
| **Total** | **7,473** | **8,829** | **1,356** |




4.3.5 The comparison of three-year average data shows that the average number of works completed between Years 10 and 12 is 18% higher than the previous three-year period.

4.3.6 The number of highways works completed has fallen by 26% over the last three years from between 800 and 1,000 in Years 7 through 9, to between 600 and 800 over the last three years.

4.3.7 Over the same period, the number of utility works completed has increased by 24%

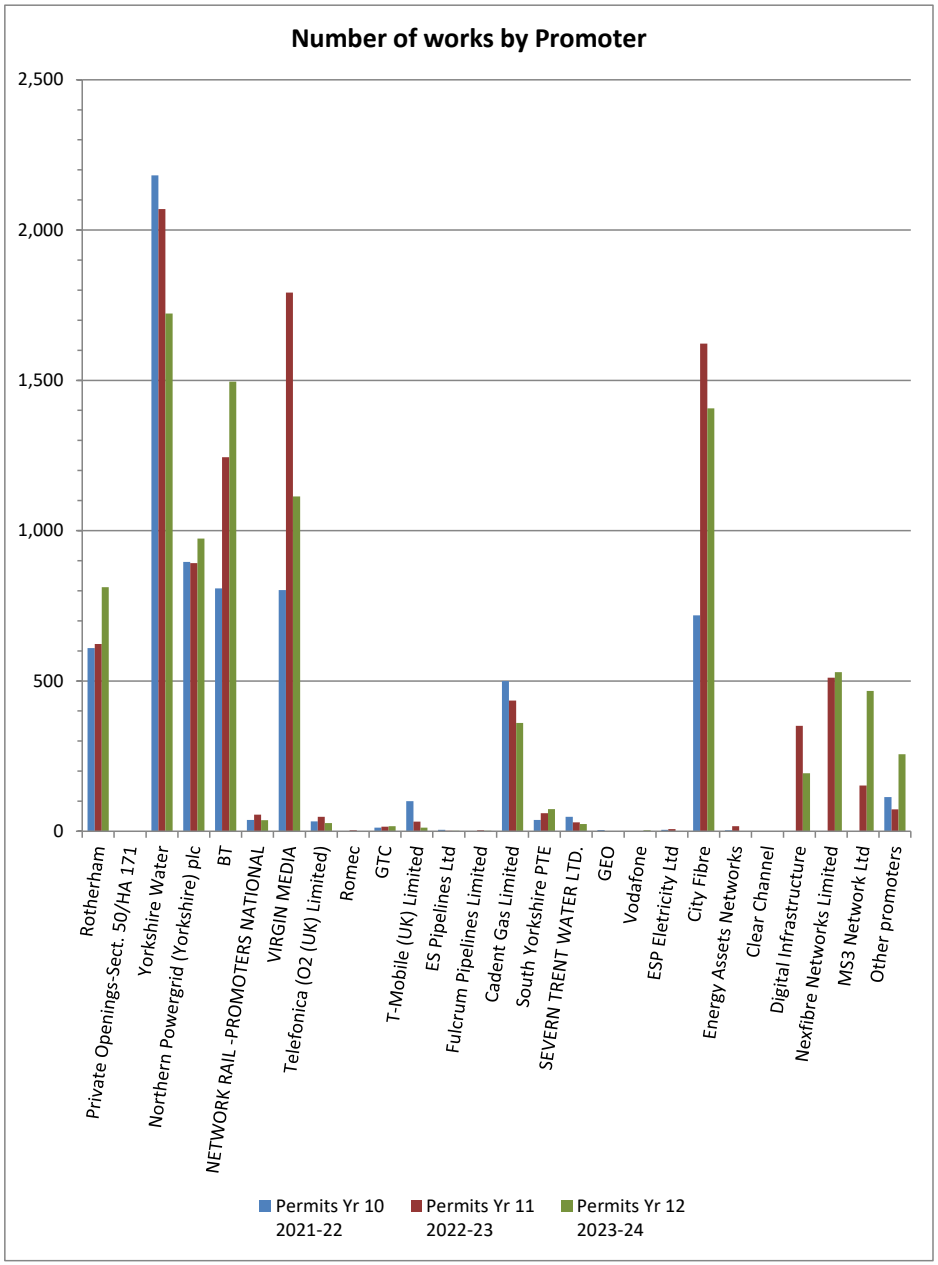
***Recommendation Yr12-01: Review the number of permits raised for highway works to ensure all highway works are being closed out correctly and, identify if all works requiring a permit are being properly recorded in the scheme.***

## 4.4 Works promoter analysis

4.4.1 The change in number of works completed by each promoter is presented in Table 5 and the accompanying chart.

## Table 5 Number of works completed by promoter

| PROMOTER | Permits Yr 10 2021-22 | Permits Yr 11 2022-23 | Permits Yr 12 2023-24 |
|---|---|---|---|
| Rotherham | 609 | 623 | 812 |
| Private Openings-Sect. 50/HA 171 | | 1 | |
| Yorkshire Water | 2,182 | 2,070 | 1,722 |
| Northern Powergrid (Yorkshire) plc | 896 | 892 | 974 |
| BT | 808 | 1,244 | 1,496 |
| NETWORK RAIL -PROMOTERS NATIONAL | 38 | 55 | 37 |
| VIRGIN MEDIA | 802 | 1,792 | 1,114 |
| Telefonica (O2 (UK) Limited) | 33 | 48 | 27 |
| Romec | 1 | 3 | |
| GTC | 12 | 15 | 17 |
| T-Mobile (UK) Limited | 100 | 32 | 12 |
| ES Pipelines Ltd | 5 | 2 | 2 |
| Fulcrum Pipelines Limited | 1 | 3 | 2 |
| Cadent Gas Limited | 500 | 435 | 360 |
| South Yorkshire PTE | 38 | 60 | 74 |
| SEVERN TRENT WATER LTD. | 48 | 30 | 24 |
| GEO | 4 | | |
| Vodafone | 1 | 1 | 3 |
| ESP Eletricity Ltd | 5 | 7 | |
| City Fibre | 718 | 1,622 | 1,407 |
| Energy Assets Networks | 3 | 17 | 1 |
| Clear Channel | | | |
| Digital Infrastructure | | 351 | 193 |
| Nexfibre Networks Limited | | 511 | 529 |
| MS3 Network Ltd | | 152 | 467 |
| Other promoters | 114 | 73 | 256 |
| **Total** | **6,918** | **10,039** | **9,529** |




4.4.2 Over the three-year period, the number of works completed by telecoms operators – BT, Virgin Media and City Fibre – has increased.

4.4.3 Years 11 and 12 also saw several new utilities operating across the network – including Digital Infrastructure, Nexfibre Networks and MS3 Networks.

4.4.4 The increase is more significant in Years 11 and 12 and is the main reason for the large increase in permit activity over the last two years.

4.4.5 A comparison of the number of works completed by promoter type is presented in Figure 1.

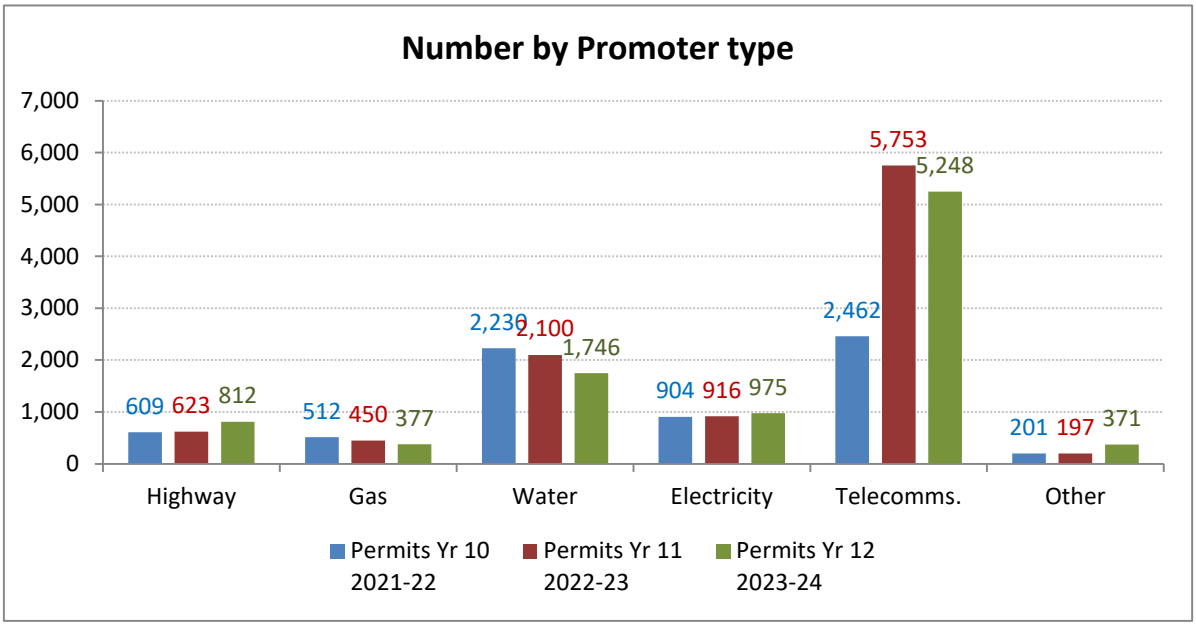
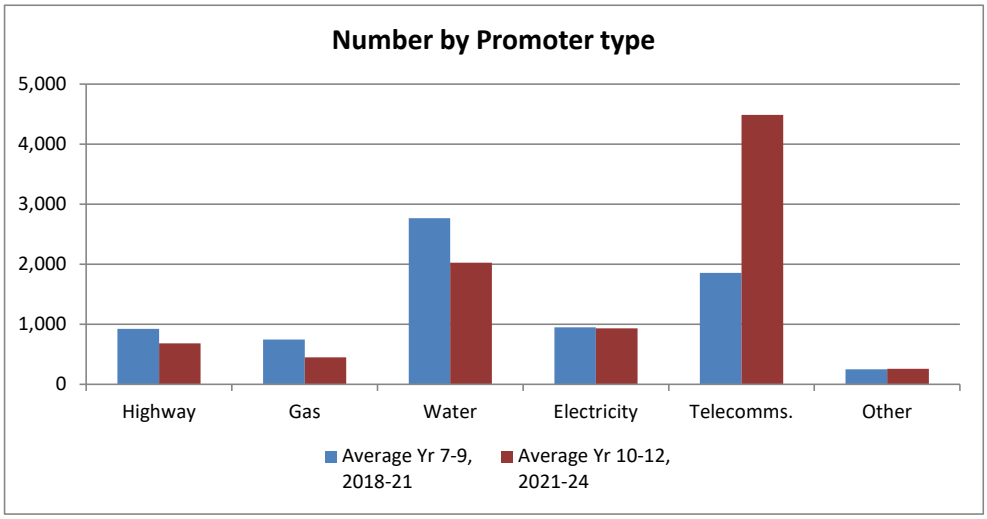



**Figure 1 Number of works by promoter group**

4.4.6 A comparison of the average number of works completed in each three-year period by promoter group is shown below in Table 6.

**Table 6 Promoter groups, change from Years 7 to 9 (3 year average)**

| WORKS STOPPED | Average Yr 7-9, 2018-21 | Average Yr 10-12, 2021-24 | Difference |
|---|---|---|---|
| Highway | 921 | 681 | -239 |
| Gas | 742 | 446 | -296 |
| Water | 2,764 | 2,025 | -739 |
| Electricity | 946 | 932 | -15 |
| Telecomms. | 1,852 | 4,488 | 2,636 |
| Other | 248 | 256 | 9 |
| **Total** | **7,473** | **8,829** | **1,356** |




4.4.7 The above data shows a reduction in works completed by the highway authority and gas and water utilities from Year 10. The average number of works completed by telecoms operators has increased from 1,852 between Years 7 and 9 to 4,488 over the last three years – an increase of almost 150%.

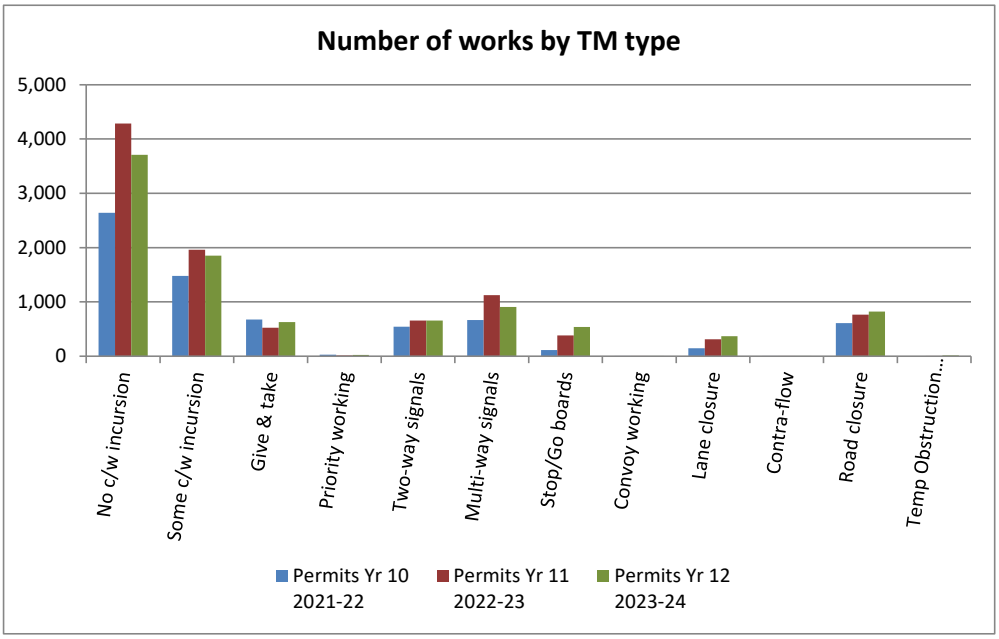
## 4.5 Detailed analysis

4.5.1 The following detailed analysis is presented for works completed by all promoters. The same analysis is presented separately in Appendix A for highway authority works and utility company works.

4.5.2 Table 7 and the accompanying chart presents a comparison of the change in number of all works completed by traffic management type.

**Table 7 Traffic management type**

| TRAFFIC MANAGEMENT TYPE | Permits Yr 10 2021-22 | Permits Yr 11 2022-23 | Permits Yr 12 2023-24 |
|---|---|---|---|
| No c/w incursion | 2,642 | 4,284 | 3,709 |
| Some c/w incursion | 1,477 | 1,960 | 1,852 |
| Give & take | 675 | 527 | 629 |
| Priority working | 30 | 13 | 22 |
| Two-way signals | 546 | 657 | 656 |
| Multi-way signals | 667 | 1,126 | 907 |
| Stop/Go boards | 116 | 385 | 541 |
| Convoy working | 2 | 1 | 1 |
| Lane closure | 149 | 312 | 369 |
| Contra-flow | 4 | 4 | 7 |
| Road closure | 610 | 768 | 821 |
| Temp Obstruction 15min delay | | 2 | 15 |
| **Total** | **6,918** | **10,039** | **9,529** |

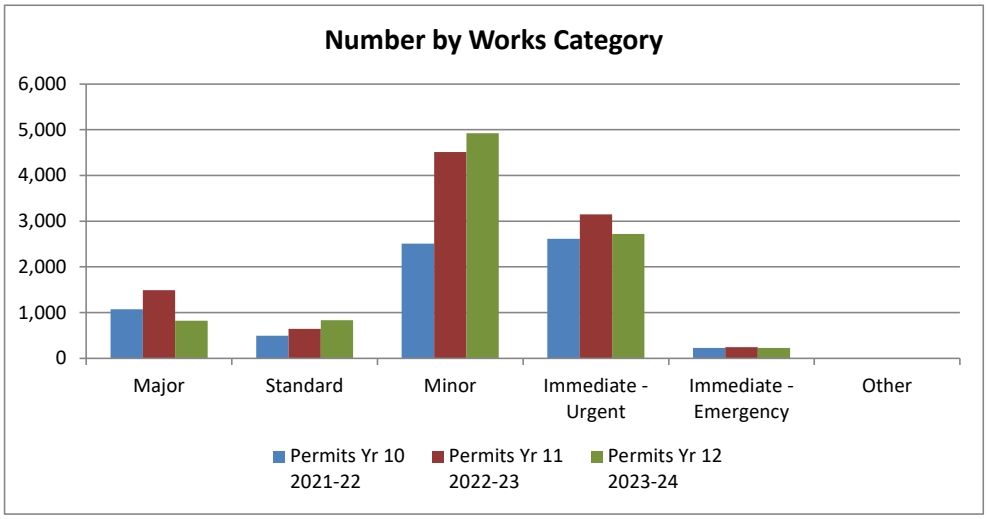



4.5.3 The majority of the additional works completed in Years 11 and 12 are recorded as operating with no or some carriageway incursion. This is logical as a number of the additional telecoms works associated with broadband fibre rollout will be on footpaths in residential areas.

4.5.4 The total number of works completed by category is shown in Table 8 and the accompanying chart.

**Table 8 Works categories**

| WORKS STOPPED | Permits Yr 10 2021-22 | Permits Yr 11 2022-23 | Permits Yr 12 2023-24 |
|---|---|---|---|
| Major | 1,072 | 1,491 | 820 |
| Standard | 494 | 646 | 835 |
| Minor | 2,507 | 4,514 | 4,925 |
| Immediate - Urgent | 2,617 | 3,146 | 2,721 |
| Immediate - Emergency | 228 | 242 | 228 |
| Other | | | |
| **Total** | **6,918** | **10,039** | **9,529** |




4.5.5 The number of Minor works completed in Years 11 and 12 have almost doubled compared with Year 10 – an additional 2,000 to 2,400 works over the last two years.

4.5.6 The number of Major works reduced slightly in Year 12 to 20 from over 1,000 in the three years before.

4.5.7 The increase in the number of Standard works offsets the reduction in Major works.

## 4.6 Works occupancy

4.6.1 Table 9 shows a comparison of the average works duration for all works completed in each year.

**Table 9 Average works duration and occupancy**

| DURATION | Permits Yr 10 2021-22 | Permits Yr 11 2022-23 | Permits Yr 12 2023-24 |
|---|---|---|---|
| Average duration (days) | 3.4 | 3.4 | 3.8 |
| **Total number of days worked (Permits)** | **23,581** | **34,229** | **36,367** |

4.6.2 The above table shows the total number of days worked for all works completed across the network in row 2 and the total number of days recorded for works requiring a permit in the third row.

4.6.3 Average works duration ranged from 3.4 to 3.8 days over the last three years. This is lower than the 3.9 days to 4.2 days duration recorded over the three previous years.

4.6.4 The increase in the number of days worked in Years 11 and 12 is a result of the 30% increase in the number of works compared with Year 10.

4.6.5 The total number of days worked in each year is compared in Figure 2.

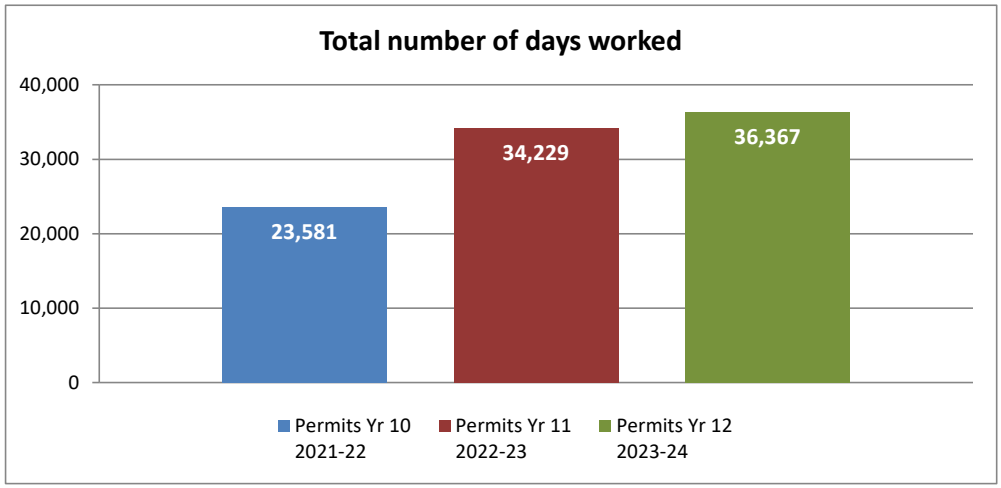



**Figure 2 Number of days on all works**

4.6.6 Table 10 shows a comparison of the average works duration and occupancy for Years 10 to 12 and the previous three-year period.

**Table 10 Average duration and occupancy comparison, 3-year average**

| DURATION | Average Yr 7-9, 2018-21 | Average Yr 10-12, 2021-24 | Difference |
|---|---|---|---|
| Average duration (days) | 4.1 | 3.5 | -0.6 |
| **Total number of days worked** | **30,632** | **31,392** | **761** |
| **Total number of days worked (Permits)** | **15,472** | **31,392** | **15,920** |

4.6.7 While the number of works has increased over the last few years, the total occupancy has increased by less than 2.5% compared with the previous three year average.

4.6.8 The reduction in average duration to 3.5 days from 4.1 days has reduced the impact of the increase in works recorded over the last three years.

## 4.7 Scheme benefit

4.7.1 The average duration of all works in each of the last 9 years is shown in Figure 3.

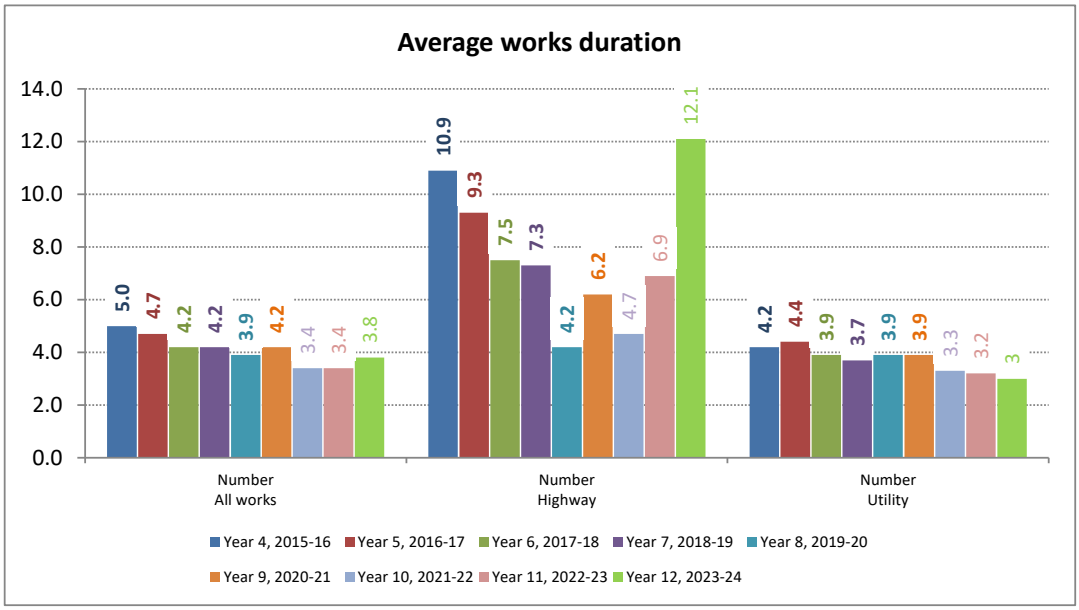



**Figure 3 Average duration of works**

4.7.2 The trend for overall average works duration has been generally downwards over the last 9 years, other than a small increase in Years 9 and 12.

4.7.3 Year 12 recorded a large increase in the average duration of highway works. Utility works average duration has continued the downward trend, with the average duration of 3.0 days the lowest recorded since the scheme went live.

***Recommendation Yr12-02: Review highway works records to ensure all permits are being closed out correctly and on time.***

4.7.4 The total number of days worked in each of the last six years is presented in Figure 4.

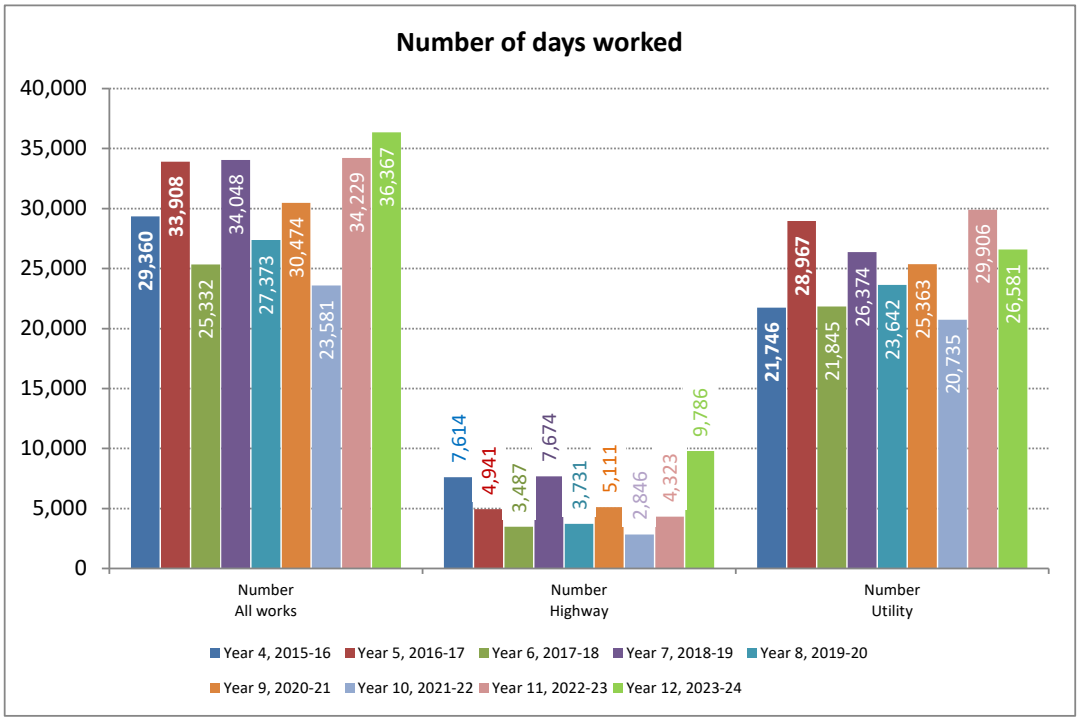



**Figure 4 Number of days worked per annum**

4.7.5 The total duration of all works across the network has been relatively consistent in each year. This is despite a near 40% increase in the average number of works completed in the last two years.

# 5 KPI MONITORING

## 5.1 Introduction

5.1.1 The analysis of the Year 10 to 12 KPI data is presented for the following Key Performance Indicators;

- **KPI 1**, the number of Permit and Permit Variation applications received, and a breakdown of the number granted and refused
- **KPI 2**, the number of conditions applied by condition type
- **KPI 3**, the number of approved Permit variations (extensions)
- **KPI 4**, the number of early start requests and the number granted and refused
- **KPI 7**, the number of inspections carried out to monitor conditions

5.1.2 The above data should be presented separately for highway authority and utility company applications to demonstrate parity in the application of the Scheme.

5.1.3 Since the scheme was extended to include all streets during the middle of the review period, in March 2020, the absolute numbers will have increased significantly compared with previous years.

5.1.4 The following additional metrics have also been reported;

- **AM5**, the number of Fixed Penalty Notices (FPN) given, and a breakdown by works promoter
- **OM6,** the number of collaborative works and the number of working days saved
- **OM7,** the number of deemed permit applications

## 5.2 KPI review

***KPI 1, Permit & Permit Variation applications***

5.2.1 The number and proportion of Permit and Permit Variation applications received and refused. A breakdown of the number of permit applications received and the refusal rate is shown in Table 11.

**Table 11 KPI 1, Permit applications granted and refused**

| PROMOTER TYPE | Year 10, 2021-22 | | | Year 11, 2022-23 | | | Year 12, 2023-24 | | |
|---|---|---|---|---|---|---|---|---|---|
| | Granted | Refused | Refused % | Granted | Refused | Refused % | Granted | Refused | Refused % |
| Highway Authority | 1,316 | 89 | 5.6% | 1,447 | 90 | 5.2% | 1,465 | 176 | 8.9% |
| Utility | 10,653 | 1,985 | 13.0% | 16,009 | 2,499 | 11.0% | 13,184 | 2,611 | 13.8% |
| **ALL PROMOTERS** | **11,969** | **2,074** | **12.3%** | **17,456** | **2,589** | **10.6%** | **14,649** | **2,787** | **13.4%** |

5.2.2 The number of permits and permit variations granted peaked in Year 11 at 17,456. This is 46% higher than Year 10 and 19% higher than Year 12.

5.2.3 Since the extension of the scheme in March 2020, the number of permits granted has increased from around 3,000 to more than 11,000.

5.2.4 Between 2,000 and 2,800 permits were refused in the last three years. The refusal rate has increased slightly to 11% to 13% in the last three years. The refusal rate in the two years following the extension of the scheme in 2020 was between 9% and 10%.

5.2.5 The refusal rate for highway applications increased from 5% to 8.9% in the last year. The refusal rates are presented graphically in Figure 5.

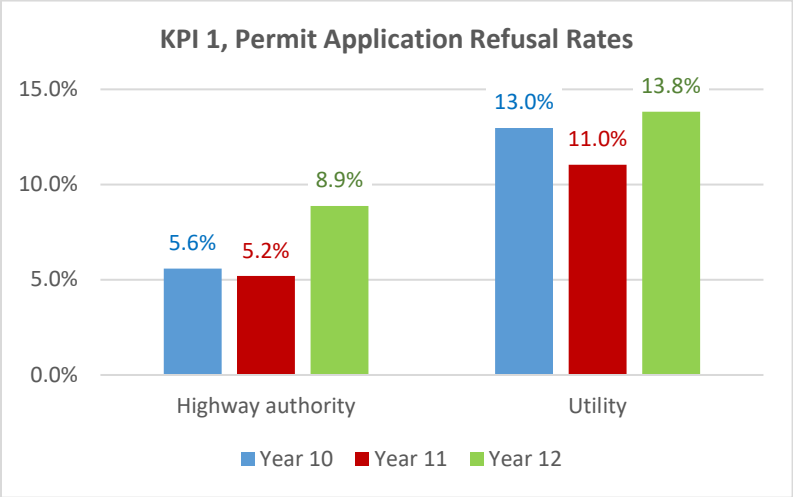



**Figure 5: KPI 1, Permit Application Refusal Rates**

5.2.6 Where possible, permit modification requests have been used in preference to refusing the initial permit application. This demonstrated in Table 12 and Figure 6 which shows the number of PMR issued and the proportion of PMR to permit applications received.

**Table 12 KPI 1, Permit modification requests**

| PROMOTER TYPE | Year 10, 2021-22 | | | Year 11, 2022-23 | | | Year 12, 2023-24 | | |
|---|---|---|---|---|---|---|---|---|---|
| | Applications | PMR | PMR % | Applications | Refused | PMR % | Applications | Refused | PMR % |
| Highway Authority | 1,411 | 181 | 12.8% | 1,547 | 186 | 12.0% | 1,792 | 190 | 10.6% |
| Utility | 12,656 | 2,649 | 20.9% | 18,544 | 4,090 | 22.1% | 16,439 | 2,454 | 14.9% |
| **ALL PROMOTERS** | **14,067** | **2,830** | **20.1%** | **20,091** | **4,276** | **21.3%** | **18,231** | **2,644** | **14.5%** |

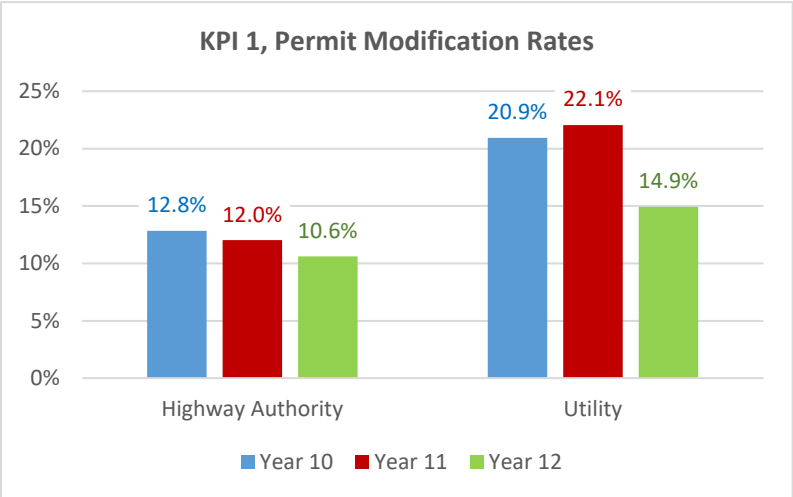



**Figure 6: KPI 1, Permit Modification Request Rates**

5.2.7 The number of PMR returned has increased significantly in the last three years. From fewer than 1,521 in previous years to between 2,600 and 4,300 over the last three years.

5.2.8 PMR have been returned for 11% to 13% of highway applications and 15% to 22% of utility applications. This is significantly higher than between 6% and 11% of applications in previous years.

***KPI 2, Permit conditions***

5.2.9 The number of conditions applied for highway and utility permit applications is shown in Table 13.

**Table 13 KPI 2, Permit Conditions**

| All Conditions | Year 10, 2021-22 | | | Year 11, 2022-23 | | | Year 12, 2023-24 | | |
|---|---|---|---|---|---|---|---|---|---|
| | HA | PU | All | HA | PU | All | HA | PU | All |
| TOTAL | 933 | 44,625 | 45,558 | 1,380 | 73,420 | 74,800 | 2,658 | 71,564 | 74,222 |
| | 2% | 98% | | 2% | 98% | | 4% | 96% | |

5.2.10 The increase in the number of conditions submitted follows the increase in volume of permit applications over the last two years.

5.2.11 The majority of conditions are applied to utility applications. Approximately 1 in 30 of conditions are applied to highway permit applications in each year.

5.2.12 The number of conditions applied by condition type for utility permit applications is shown in Figure 7.

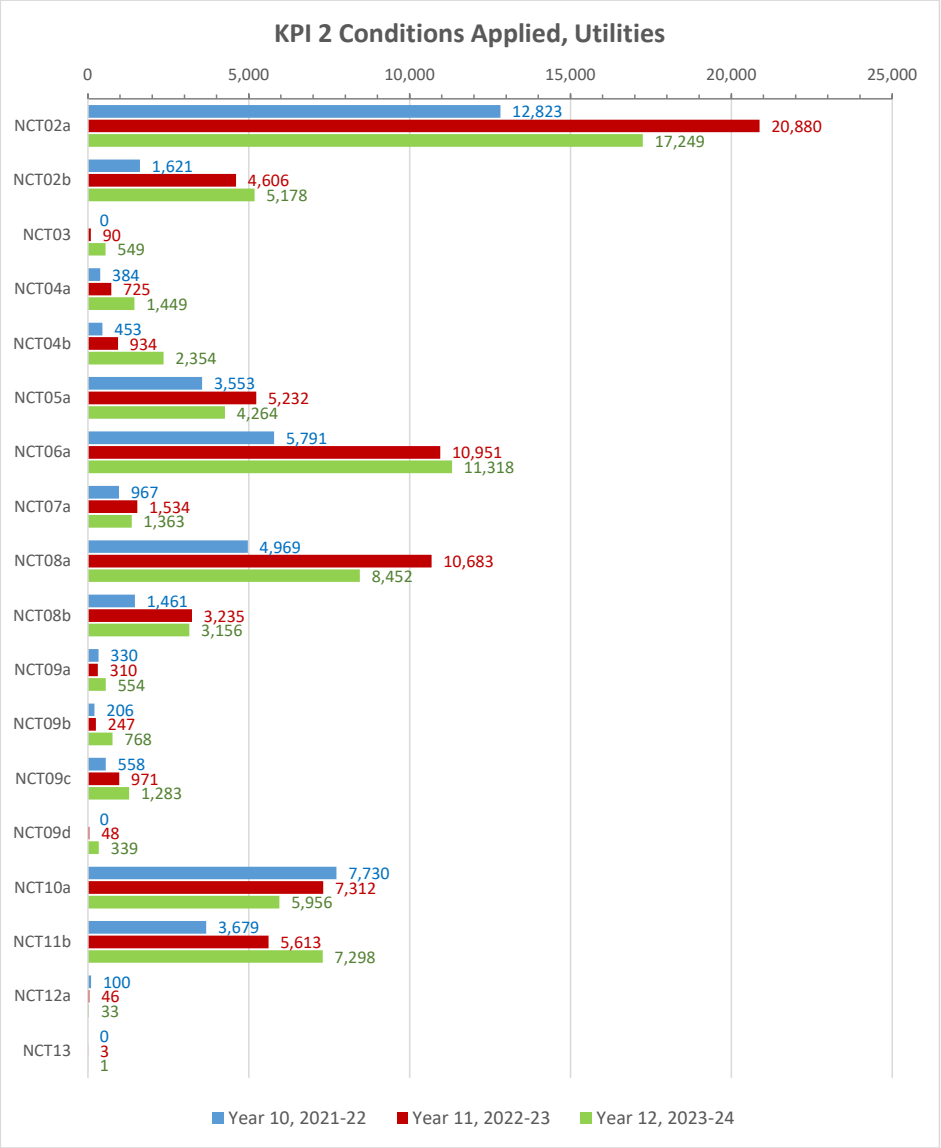



**Figure 7: KPI 2, Conditions Applied**

5.2.13 While the number of conditions applied in Years 11 and 12 is higher due to the large increase in the number of permits submitted and most of the conditions have increased in proportion to the change, the proportion of the following conditions has increased more:

- **NCT06a,** road space available to traffic and pedestrians through the works
- **NCT08a,** the requirement for traffic management control
- **NCT11b,** publicity and consultation relating to the works

***KPI 3, Duration extension requests***

5.2.14 The number of duration extension requests granted and refused, is shown in Table 14 for all promoters, and separately for highway authority applications and for statutory undertakers.

**Table 14 KPI 3, Permit Extension requests received and refused**

| PROMOTER TYPE | Year 10, 2021-22 | | | Year 11, 2022-23 | | | Year 12, 2023-24 | | |
|---|---|---|---|---|---|---|---|---|---|
| | Granted | Refused | Refused % | Granted | Refused | Refused % | Granted | Refused | Refused % |
| Highway Authority | 33 | 0 | 0.0% | 33 | 4 | 12.1% | 54 | 0 | 0.0% |
| Utility | 928 | 51 | 5.5% | 1,362 | 48 | 3.5% | 1,067 | 64 | 6.0% |
| **ALL PROMOTERS** | **961** | **51** | **5.3%** | **1,395** | **52** | **3.7%** | **1,121** | **64** | **5.7%** |

5.2.15 The refusal rate for extension applications is relatively consistent in each year, at between 4% and 6%. Fewer than 65 requests submitted by utilities were refused in each year.

5.2.16 Following an increase in Year 9, the number of requests has remained relatively consistent at between 950 and 1,400 in the last three years. Any variation in number is in proportion to the change in the number of permit applications submitted in each year.

5.2.17 The number of extension requests agreed for highway authority and utility permits is shown in Figure 8.

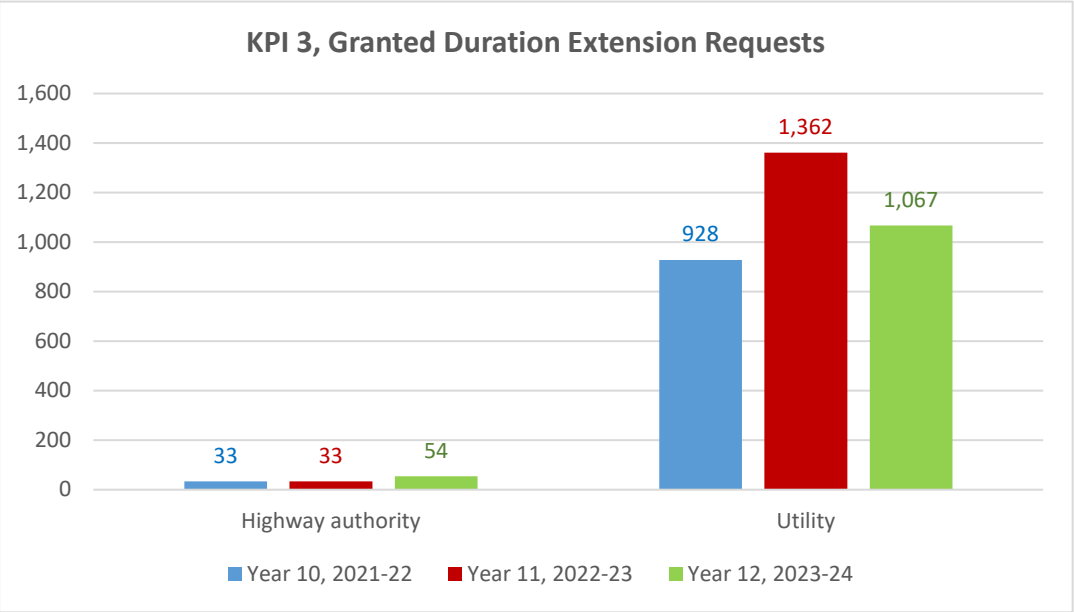



**Figure 8: KPI 3, Permit Extensions**

***KPI 4, Early start requests***

5.2.18 The number of requests to start early and the number agreed is shown in Table 15.

**Table 15 KPI 4, Early start requests**

| PROMOTER TYPE | Early Starts Agreed | | |
|---|---|---|---|
| | Year 10 | Year 11 | Year 12 |
| Highway authority | 472 | 460 | 527 |
| Utility | 690 | 1,554 | 827 |
| ALL PROMOTERS | **1,162** | **2,014** | **1,354** |

5.2.19 The number of requests for an early start to agreed highway works is relatively consistent in each year.

5.2.20 Early start requests for highway works makes up a higher proportion of all than the proportion of highway permits granted to utility permits. Approximately 40% of early start requests relate to highway permits while fewer than 10% of permits and permit variations granted are for works undertaken by the highway authority.

5.2.21 The number of early starts agreed are shown in Figure 9.

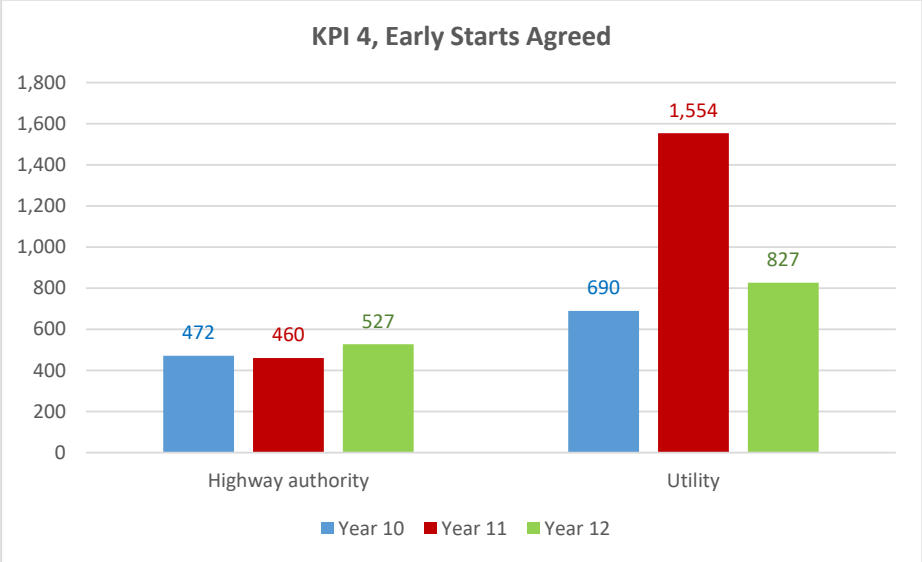



**Figure 9: KPI 4, Early Starts Agreed**

***KPI 7, Permit inspections***

5.2.22 The number of permit inspections recorded is between 475 and 694 in each year. The highest number of inspections were recorded in the last year 2023-24. The number of compliant and non-compliant inspections and the failure rate are shown for each year in Table 16.

**Table 16 KPI 7, Permit Condition Inspections**

| ALL PROMOTERS | Passed | Non-Compliant | No. Inspections | Failure (%) |
|---|---|---|---|---|
| Year 10, 2021-22 | 349 | 169 | 518 | 33% |
| Year 11, 2022-23 | 235 | 240 | 475 | 51% |
| Year 12, 2023-24 | 447 | 247 | 694 | 36% |
| **TOTAL** | **1,031** | **656** | **1,687** | **39%** |

5.2.23 The proportion of non-compliant inspections ranges from 33% to 51%, with between 169 and 247 non-compliant works reported.

5.2.24 The number of passed and non-compliant inspections in each year shown in Figure 10.

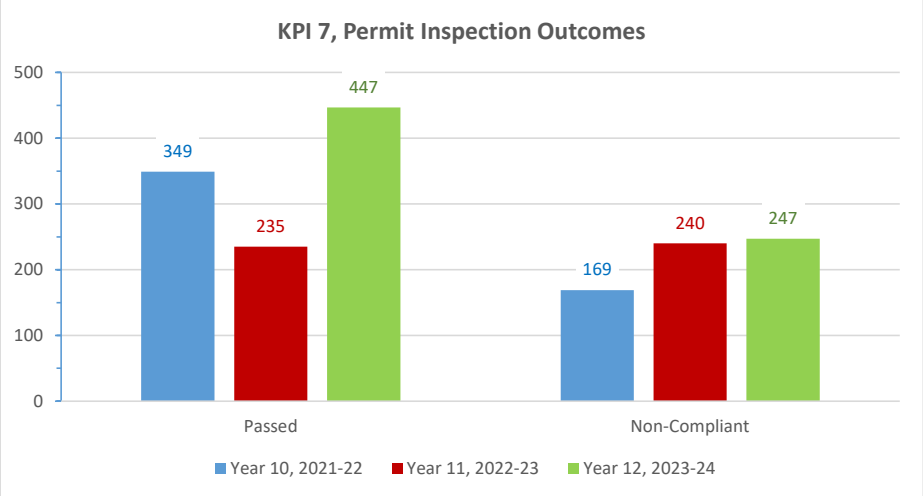



**Figure 10: KPI 7 , Permit Inspection Outcomes**

***AM5, FPN given***

5.2.25 The number of FPN given in each year is shown in Table 17.

**Table 17 AM5, Fixed Penalty Notices given**

| FPN TYPE | Year 10, 2021-22 | | Year 11, 2022-23 | | Year 12, 2023-24 | |
|---|---|---|---|---|---|---|
| | Highway | Utility | Highway | Utility | Highway | Utility |
| 70(6) | | 11 | | 12 | | 65 |
| 74(7B) | | 195 | 100 | 364 | | 268 |
| 19(1) working without permit | | 137 | 2 | 184 | | 164 |
| 20(1) breach of conditions | | 163 | | 275 | | 284 |
| **TOTAL** | **0** | **514** | **102** | **861** | **0** | **766** |

5.2.26 During the last three years the number of FPN given to utilities has increased significantly compared with Years 7 to 9. Between 514 and 861 FPN were given between Years 10 and 12, with 300 to 459 FPN given for breaches of permit conditions.

5.2.27 The number of FPN given for Section 19(1) operating without a valid permit and Section 20(1) a breach of permit conditions is shown in Figure 11.

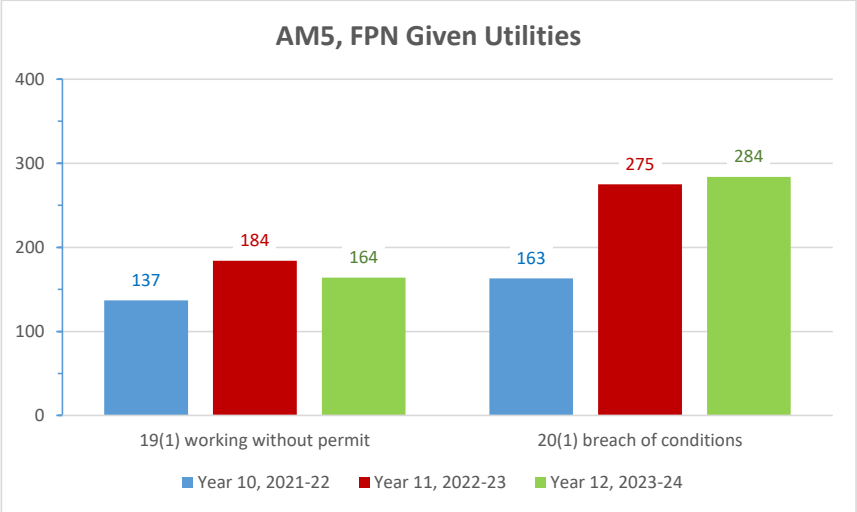



**Figure 11: AM5, Fixed Penalty Notices Issued**

5.2.28 The number of FPN given for works operating without a valid permit - Section 19(1) - has been relatively consistent in each year.

5.2.29 The number given for breaches of permit conditions – Section 20(1) – has increased in the last two years in line with the increase in permit activity since 2022.

***OM6, Collaborative working***

5.2.30 There are no collaborative working phases reported since 2020.

***Recommendation Yr12-03: Explore opportunities for works promoters to work collaboratively in future years.***

***OM7, Deemed permit applications***

5.2.31 The number of deemed permit applications in each year is shown in Figure 12.

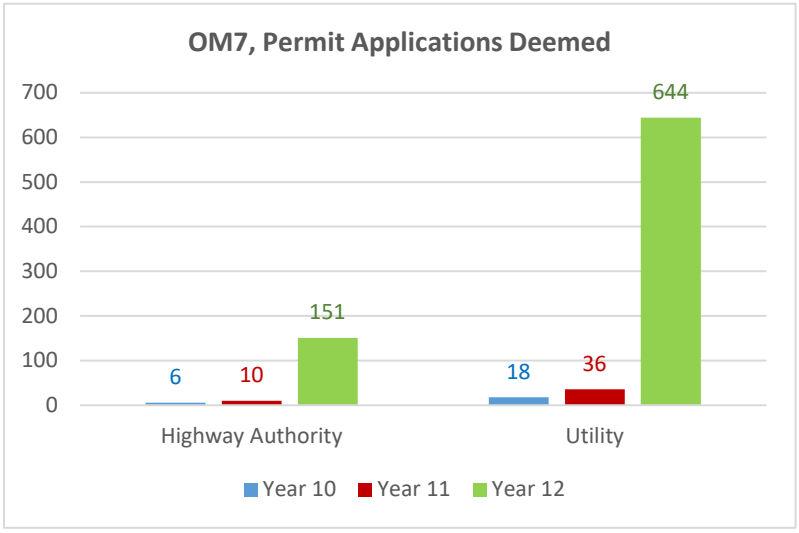



**Figure 12: OM7, Deemed permit applications**

5.2.32 The data shows a large increase in applications deemed in Year 12 - from between 24 and 36 in previous years to almost 800 last year. The data shows a large increase for highway and utility permit applications.

5.2.33 It is thought that the change in regulations relating to opening and closing works taking place out of hours – e.g. overnight, at weekends and during holiday periods – is the reason for this increase. Short duration works can be recorded as closed before the initial notification of works is seen by Council staff during normal working hours.

# 6 STAFFING & RESOURCE

## 6.1 Summary

6.1.1 The YCPS common scheme review reported the fee income review annually from 2012 to 2015.

6.1.2 A review of permit fee income and scheme operating costs covering the period 2015 to 2021 was carried out and reported in the 2018-2021 permit scheme evaluation report.

6.1.3 The review found that the scheme had accumulated a loss of £112,940 over the six-year review period. This was a result of a combination of rising staff costs (increasing by 9.7% on average between 2015 and 2021) and the under-recovery of the utilities' share of the allowable costs.

6.1.4 Permit fees were adjusted in April 2023 to:

- avoid further losses in subsequent years, and;
- recover losses accumulated since the start of the scheme.

6.1.5 This review updates the fee analysis to include the period 2021 to 2024.

6.1.6 Since the Year 9 review was completed covering the period 2015-21, scheme costs have continued to increase over the last three years, with upwards pressure on many fronts, including:

6.1.7 Staff salaries increased by 21% on average since 2021, due to cost of living increases and staff restructuring and regrading as a result of recruiting an additional two members of staff to the permits team. This has increased the cost to Council to operate the permit scheme compared with the costs calculated in the previous review.

6.1.8 The average number of permits granted to external works promoters during the last two years is 40% to 55% higher than recorded in the previous two year period. This increase coincides with an increase in telecoms works associated with fibre roll out to residential and commercial properties across the authority area.

## 6.2 Permit activity

6.2.1 The number of permits granted between 2015 and 2018 was relatively consistent at 1,200 to 1,700.

6.2.2 Year 8 saw an increase to almost 2,500 permits granted, due to the extension of the scheme to include Category 3 and 4 Non-Traffic Sensitive streets three months before the end of the one year period, on 12th March 2020.

6.2.3 The first full year of the extended scheme, Year 9 2020-21, saw a threefold increase to over 7,500 permits granted.

6.2.4 This review period has seen further significant increases in permits granted, with an additional 1,200 (15% increase over Year 9 numbers) permits granted for external works promoters in Year 10 and then 55% more in Year 11 and falling back slightly to 40% more in Year 12.

6.2.5 Permit variations have also increased from 2.500 to 3,000 in Years 9 and 10 to over 4,700 in the last two years.

6.2.6 The number of permits and permit variations granted between 2018 and 2024 is presented in the chart in Figure 13.

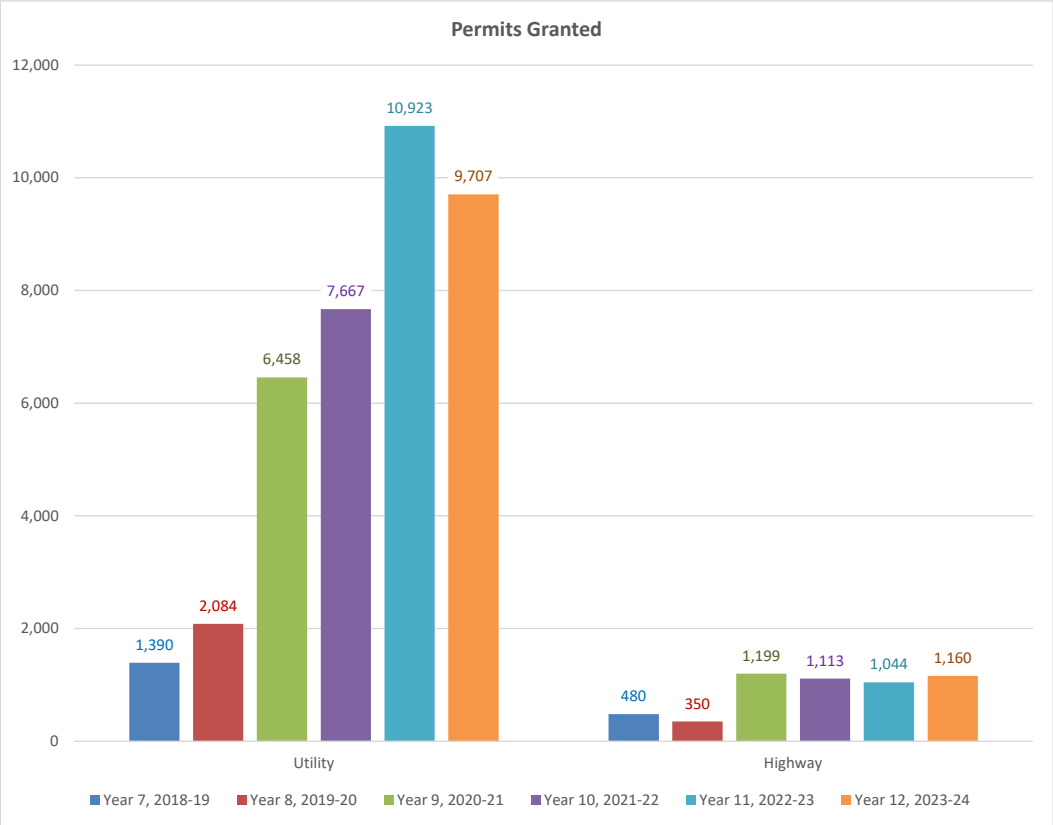



**Figure 13: Permit applications granted 2018-24**

*Note: Permit scheme changed to cover all streets on 12th March 2020*

## 6.3 Staff resource

6.3.1 Using the actual number of utility and highway authority permit applications granted in each year, the same Fees Matrix spreadsheet calculates the total number of FTE staff requirement as follows in Table 18.

**Table 18 Years 10 to 12 staff resource, 2021-2024**

| | Highway Works | | | Utilities | | |
|---|---|---|---|---|---|---|
| PERSONNEL LEVEL | Year 10 | Year 11 | Year 12 | Year 10 | Year 11 | Year 12 |
| Street Works Officer | 0.5 | 0.5 | 0.6 | 2.3 | 3.2 | 2.5 |
| Street Works Co-ordinator | 0.7 | 0.7 | 0.8 | 2.6 | 3.7 | 2.6 |
| Traffic Manager | 0.0 | 0.0 | 0.1 | 0.2 | 0.2 | 0.2 |
| **Total employees** | **1.3** | **1.2** | **1.4** | **5.0** | **7.2** | **5.3** |

6.3.2 The total number of staff required is calculated at 6.3 FTE in Year 10, 8.4 FTE in Year 11 and 6.7 FTE in Year 12. This compares with 2.3 to 6.0 FTE between Years 7 and 9.

6.3.3 The number of full time equivalent staff required to process utility applications is between 5.0 and 7.2 over the last three years.

6.3.4 The number calculated from the Fees Matrix covering the last six years is shown in Figure 14. The increase in staff resource required following the extension of the scheme to include all streets in 2020 is clear.

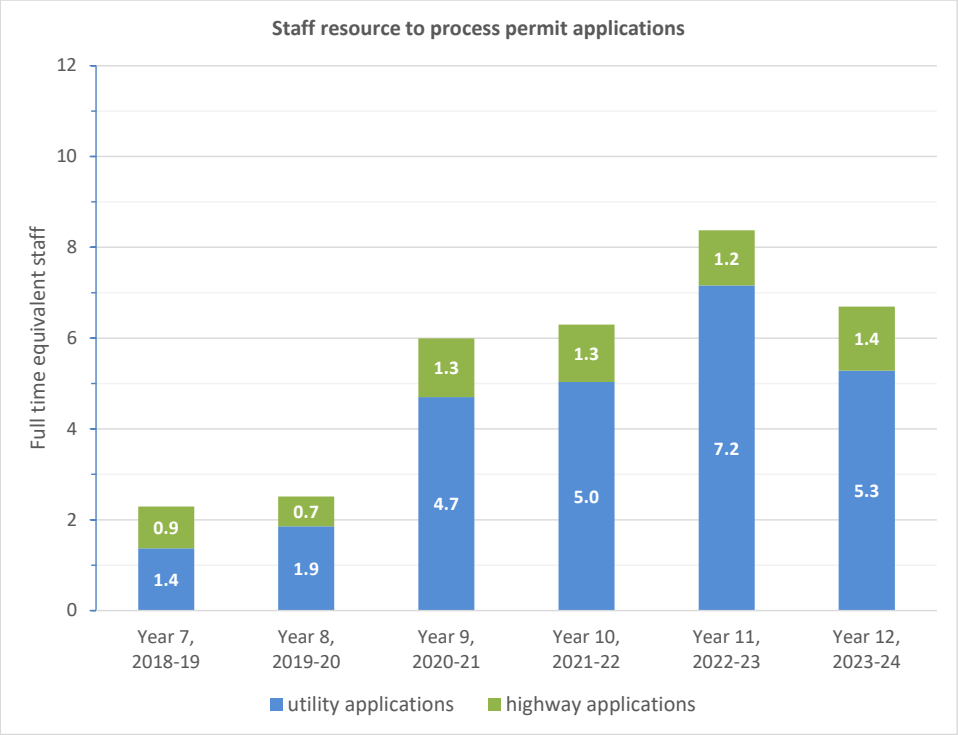



**Figure 14: Number of full-time staff required, Years 7 to 12**

## 6.4 Fee income

6.4.1 The total permit fees billed in each year, after applying discounts for major works with duration less than 10 days and for working at non-traffic sensitive times, was;

- Year 10, 2021-22; **£593,550**
- Year11, 2022-23; **£891,961**
- Year 12, 2023-24; **£702,691**

## 6.5 Reported losses

6.5.1 As a result of the factors described above, operating costs over the last three years are 13% to 68% higher than reported in Year 9, 2020-21. Operating costs to process utility permit applications in the last year were £717,307 compared with £514,293 in the last year of the previous fee review.

6.5.2 Permit fee income only increased by 15% over the same period, from £610,494 to £702,691.

6.5.3 Therefore the scheme reported a loss of £14,161 in the last year, or 2.1% of annual fee income. To offset this loss, a further adjustment to permit fee charges is proposed.

***Recommendation Yr12-04: Consult on increasing the remaining two permit fees to the maximum permitted level in 2025 to offset the loss reported in Year 12.***

6.5.4 All but two permit fees are currently capped at the maximum fee permitted under the Department for Transport (DfT) regulations. The Council should consider the following adjustment to permit charges:

- PAA applications, Category 3 or 4 Non-Traffic Sensitive streets - increase to £75 from £73
- Major applications, Category 3 or 4 Non-Traffic Sensitive streets - increase to £150 from £136

6.5.5 Using Year 12 permit records as an estimate, this change would affect 450 (4.6%) of the 9,707 utility permits granted in a typical year and would increase fee income by £7,000 to £8,000 in future years.

# 7 CONCLUSIONS

## 7.1 Background

7.1.1 The Rotherham Borough Council Permit Scheme went live on 12th June 2012. The scheme operated within the common permit scheme known as the *'Yorkshire Common Permit Scheme for Road Works and Street Works'*.

7.1.2 A variation was introduced in 2015 with the *'The Traffic Management (Rotherham Borough Council) Permit Scheme Order 2015'.* The new order was introduced to confirm compliance with the amended permit scheme regulations of 2015. The Rotherham Borough Council Permit Scheme came into effect on the 1st October 2015.

7.1.3 The scheme was later extended to include Non-Traffic Sensitive category 3 and 4 streets within the Council area. Following an extensive review and consultation period, the revised scheme came into effect on 12th March 2020.

7.1.4 A full Permit Scheme Review (PSR) of the scheme operation between 2018 and 2021 was completed in 2022. This review covers the next three year period, 2021 to 2024, and includes a review of the permit scheme operation and a full review of permit income and operating costs since 2021.

## 7.2 Summary

7.2.1 The number of permits has increased significantly during the last two years, from an average of 6,371 in Years 9 and 10, to 9,416 and 8,717 in Years 11 and 12. This represents an average 42% increase in permit activity in the last two years.

7.2.2 The first full year of operation for the extended scheme in Year 9, recorded a more than threefold increase in the number of permits granted. Therefore, the resource required to process permit applications has increased significantly over the last four years.

7.2.3 The data analysis shows a reduction in works completed by the highway authority and gas and water utilities since Year 10. However, the number of works completed by telecoms operators has increased from 1,852 between Years 7 and 9 to 4,488 over the last three years – an increase of almost 150%.

7.2.4 Over the three-year period, the number of works completed by telecoms operators – BT, Virgin Media and City Fibre – has almost doubled. Years 11 and 12 also saw several new utilities operating across the network – including Digital Infrastructure, Nexfibre Networks and MS3 Networks.

## 7.3 Scheme benefits

7.3.1 The trend for overall average works duration has been generally downwards over the last 9 years, other than a small increase in Years 9 and 12.

7.3.2 Year 12 recorded a large increase in the average duration of highway works. Utility works average duration has continued the downward trend, with the average duration of 3.0 days the lowest recorded since the scheme went live.

7.3.3 The total duration of all works across the network has been relatively consistent in each year. This is despite a near 40% increase in the average number of works completed in the last two years.

## 7.4 Recommendations

7.4.1 Four recommendations have been made following during this review.

7.4.2 These are broken down as follows:

*Duration and occupancy;*

***Recommendation Yr12-01: Review the number of permits raised for highway works to ensure all highway works are being closed out correctly and, identify if all works requiring a permit are being properly recorded in the scheme.***

***Recommendation Yr12-02: Review highway works records to ensure all permits are being closed out correctly and on time.***

*Key Performance Indicators;*

***Recommendation Yr12-03: Explore opportunities for works promoters to work collaboratively in future years.***

*Permit fee income;*

***Recommendation Yr12-04: Consult on increasing the remaining two permit fees to the maximum permitted level in 2025 to offset the loss reported in Year 12.***

## 7.5 Conclusions

7.5.1 This review has demonstrated that the reduction in the average duration of utility works over the last three years has allowed the network to accommodate an additional 66% to 80% works to be undertaken with only an additional 20% to 34% increase in occupancy of the network.

7.5.2 The Key Performance Indicators demonstrate that the scheme continues to provide parity of operation between highway authority and external works promoter permit applications.

7.5.3 This review has demonstrated that Scheme has achieved its stated objectives relating to reducing the duration of works across the road network in each year.

7.5.4 There are further benefits derived from reduced occupation of the highway, including;

- improves safety at road and street works
- reduces noise and air pollution

7.5.5 Furthermore, the benefits derived from operating the Permit Scheme include;

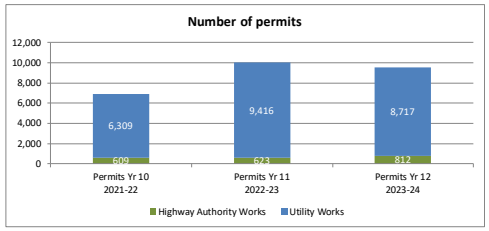
- improved coordination of activities
- improved communication between authority and utility companies
- improved accuracy of works records recorded in the Register
- reduction in customer complaints

# APPENDIX A. YEARS 10 TO 12 DETAILED ANALYSIS

## All works promoters

Table A.1: Number of permits p.a.

| PROMOTER TYPE | Permits Yr 10 2021-22 | Permits Yr 11 2022-23 | Permits Yr 12 2023-24 |
|---|---|---|---|
| Highway Authority Works | 609 | 623 | 812 |
| Utility Works | 6,309 | 9,416 | 8,717 |
| **Total** | **6,918** | **10,039** | **9,529** |




| Average Yr 7-9, 2018-21 | Average Yr 10-12, 2021-24 | Difference | |
|---|---|---|---|
| 580 | 681 | 101 | 17% |
| 3,418 | 8,147 | 4,729 | 138% |
| **3,999** | **8,829** | **4,830** | 121% |

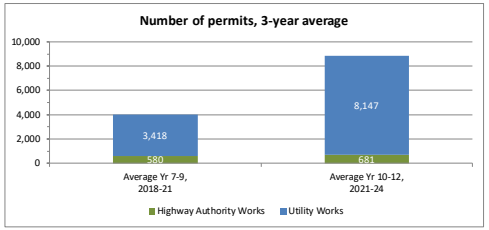
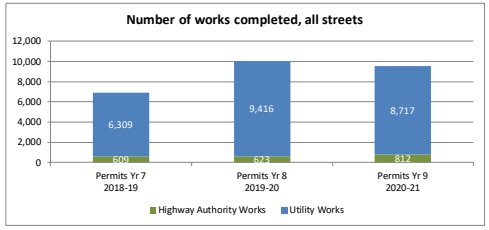



Table A.2: Number of works completed p.a.

| PROMOTER TYPE | Permits Yr 7 2018-19 | Permits Yr 8 2019-20 | Permits Yr 9 2020-21 |
|---|---|---|---|
| Highway Authority Works | 609 | 623 | 812 |
| Utility Works | 6,309 | 9,416 | 8,717 |
| **Total** | **6,918** | **10,039** | **9,529** |




| Average Yr 7-9, 2018-21 | Average Yr 10-12, 2021-24 | Difference | |
|---|---|---|---|
| 921 | 681 | -239 | -26% |
| 6,552 | 8,147 | 1,595 | 24% |
| **7,473** | **8,829** | **1,356** | 18% |

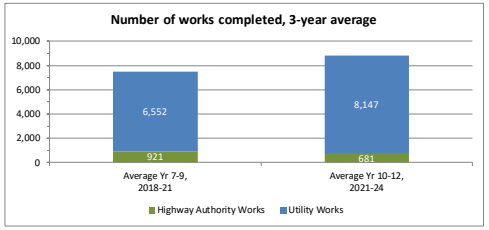
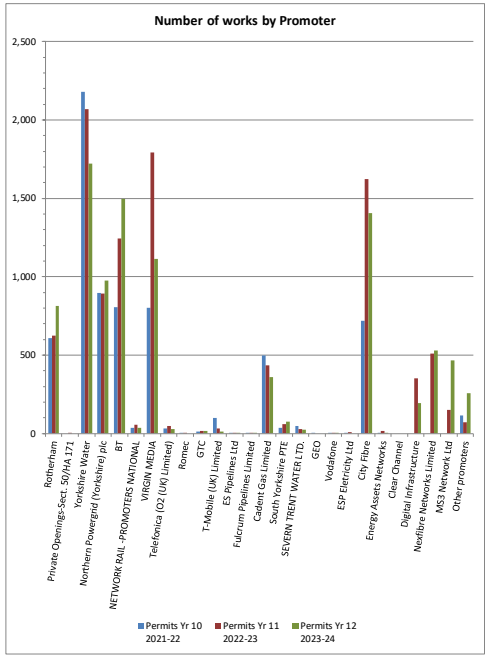


Table A.3: Number of works by Promoter

| PROMOTER | Permits Yr 10 2021-22 | Permits Yr 11 2022-23 | Permits Yr 12 2023-24 | Average Yr 7-9, 2018-21 | Average Yr 10-12, 2021-24 | Difference | |
|---|---|---|---|---|---|---|---|
| Rotherham | 609 | 623 | 812 | 921 | 681 | -239 | -26% |
| Private Openings-Sect. 50/HA 171 | | 1 | | 64 | 1 | -63 | -98% |
| Yorkshire Water | 2,182 | 2,070 | 1,722 | 2,718 | 1,991 | -727 | -27% |
| Northern Powergrid (Yorkshire) plc | 896 | 892 | 974 | 933 | 921 | -13 | -1% |
| BT | 808 | 1,244 | 1,496 | 896 | 1,183 | 287 | 32% |
| NETWORK RAIL -PROMOTERS NATIONAL | 38 | 55 | 37 | 57 | 43 | -13 | -24% |
| VIRGIN MEDIA | 802 | 1,792 | 1,114 | 551 | 1,236 | 685 | 124% |
| Telefonica (O2 (UK) Limited) | 33 | 48 | 27 | 48 | 36 | -12 | -26% |
| Romec | 1 | 3 | | 2 | 2 | 0 | -14% |
| GTC | 12 | 15 | 17 | 10 | 15 | 5 | 52% |
| T-Mobile (UK) Limited | 100 | 32 | 12 | 14 | 48 | 34 | 235% |
| ES Pipelines Ltd | 5 | 2 | 2 | 7 | 3 | -4 | -59% |
| Fulcrum Pipelines Limited | 1 | 3 | 2 | 12 | 2 | -10 | -83% |
| Cadent Gas Limited | 500 | 435 | 360 | 732 | 432 | -301 | -41% |
| South Yorkshire PTE | 38 | 60 | 74 | 91 | 57 | -34 | -37% |
| SEVERN TRENT WATER LTD. | 48 | 30 | 24 | 46 | 34 | -12 | -26% |
| GEO | 4 | | | 2 | 4 | 3 | 167% |
| Vodafone | 1 | 1 | 3 | 1 | 2 | 1 | 233% |
| ESP Eletricity Ltd | 5 | 7 | | 1 | 6 | 5 | 500% |
| City Fibre | 718 | 1,622 | 1,407 | 299 | 1,249 | 950 | 318% |
| Energy Assets Networks | 3 | 17 | 1 | 13 | 7 | -6 | -45% |
| Clear Channel | | | | 132 | | -132 | -100% |
| Digital Infrastructure | | 351 | 193 | | 272 | 272 | #DIV/0! |
| Nexfibre Networks Limited | | 511 | 529 | | 520 | 520 | #DIV/0! |
| MS3 Network Ltd | | 152 | 467 | | 310 | 310 | #DIV/0! |
| Other promoters | 114 | 73 | 256 | 13 | 148 | 135 | 1066% |
| **Total** | **6,918** | **10,039** | **9,529** | **7,562** | **9,202** | **1,640** | 22% |



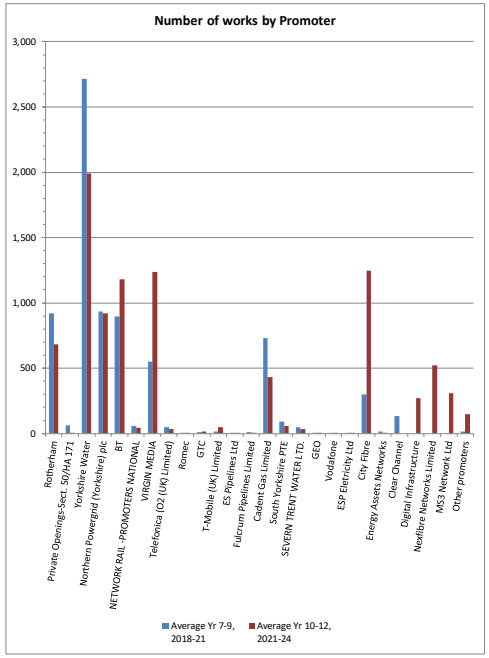
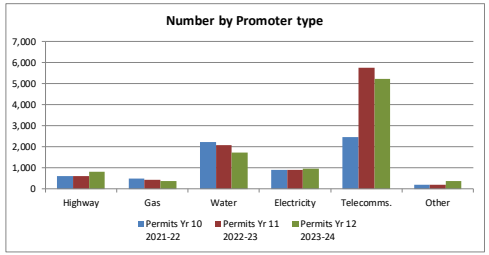



Table A.4: Number of works by promoter type

| WORKS STOPPED | Permits Yr 10 2021-22 | Permits Yr 11 2022-23 | Permits Yr 12 2023-24 |
|---|---|---|---|
| Highway | 609 | 623 | 812 |
| Gas | 512 | 450 | 377 |
| Water | 2,230 | 2,100 | 1,746 |
| Electricity | 904 | 916 | 975 |
| Telecomms. | 2,462 | 5,753 | 5,248 |
| Other | 201 | 197 | 371 |
| **Total** | **6,918** | **10,039** | **9,529** |
| **Highway percentage** | **9%** | **6%** | **9%** |




| Average Yr 7-9, 2018-21 | Average Yr 10-12, 2021-24 | Difference | |
|---|---|---|---|
| 921 | 681 | -239 | -26% |
| 742 | 446 | -296 | -40% |
| 2,764 | 2,025 | -739 | -27% |
| 946 | 932 | -15 | -2% |
| 1,852 | 4,488 | 2,636 | 142% |
| 248 | 256 | 9 | 3% |
| **7,473** | **8,829** | **1,356** | 18% |
| **12%** | **8%** | **-18%** | |

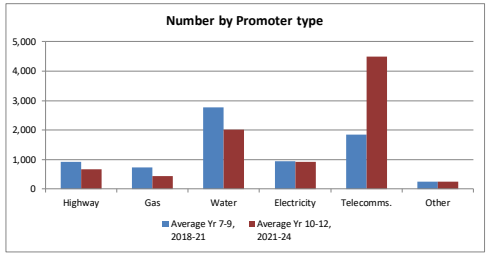
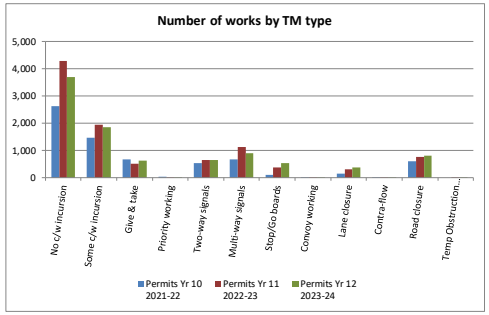



Table A.5: Number of works by traffic management type

| TRAFFIC MANAGEMENT TYPE | Permits Yr 10 2021-22 | Permits Yr 11 2022-23 | Permits Yr 12 2023-24 |
|---|---|---|---|
| No c/w incursion | 2,642 | 4,284 | 3,709 |
| Some c/w incursion | 1,477 | 1,960 | 1,852 |
| Give & take | 675 | 527 | 629 |
| Priority working | 30 | 13 | 22 |
| Two-way signals | 546 | 657 | 656 |
| Multi-way signals | 667 | 1,126 | 907 |
| Stop/Go boards | 116 | 385 | 541 |
| Convoy working | 2 | 1 | 1 |
| Lane closure | 149 | 312 | 369 |
| Contra-flow | 4 | 4 | 7 |
| Road closure | 610 | 768 | 821 |
| Temp Obstruction 15min delay | | 2 | 15 |
| **Total** | **6,918** | **10,039** | **9,529** |
| **Some c/w incursion** | **21%** | **20%** | **19%** |




| Average Yr 7-9, 2018-21 | Average Yr 10-12, 2021-24 | Difference | |
|---|---|---|---|
| 1,910 | 3,545 | 1,635 | 86% |
| 2,702 | 1,763 | -939 | -35% |
| 638 | 610 | -28 | -4% |
| 42 | 22 | -21 | -49% |
| 577 | 620 | 43 | 7% |
| 575 | 900 | 325 | 57% |
| 81 | 347 | 267 | 331% |
| 2 | 1 | -1 | -43% |
| 288 | 277 | -11 | -4% |
| 6 | 5 | -1 | -21% |
| 650 | 733 | 83 | 13% |
| 2 | 9 | 7 | 325% |
| **7,474** | **8,832** | **1,358** | 18% |
| **36%** | **20%** | **-69%** | |

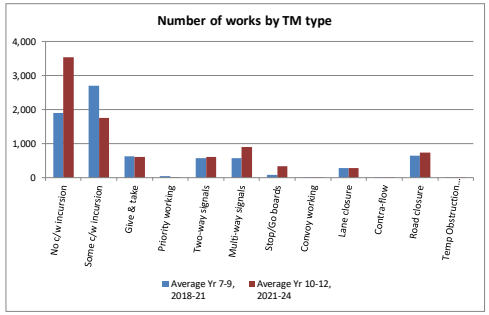
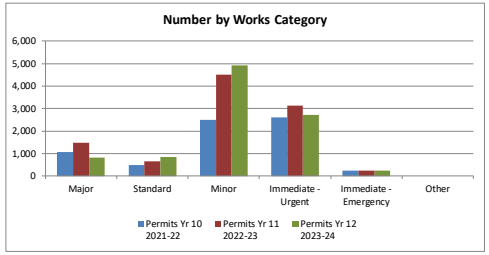



Table A.6: Number of works by works category

| WORKS STOPPED | Permits Yr 10 2021-22 | Permits Yr 11 2022-23 | Permits Yr 12 2023-24 |
|---|---|---|---|
| Major | 1,072 | 1,491 | 820 |
| Standard | 494 | 646 | 835 |
| Minor | 2,507 | 4,514 | 4,925 |
| Immediate - Urgent | 2,617 | 3,146 | 2,721 |
| Immediate - Emergency | 228 | 242 | 228 |
| Other | | | |
| **Total** | **6,918** | **10,039** | **9,529** |




| Average Yr 7-9, 2018-21 | Average Yr 10-12, 2021-24 | Difference | |
|---|---|---|---|
| 1,083 | 1,128 | 45 | 4% |
| 599 | 658 | 60 | 10% |
| 2,730 | 3,982 | 1,252 | 46% |
| 2,756 | 2,828 | 72 | 3% |
| 305 | 233 | -72 | -24% |
| 2 | | -2 | -100% |
| **7,474** | **8,829** | **1,355** | 18% |

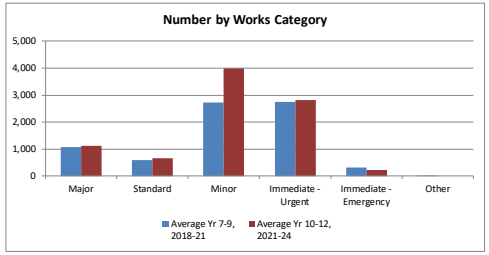
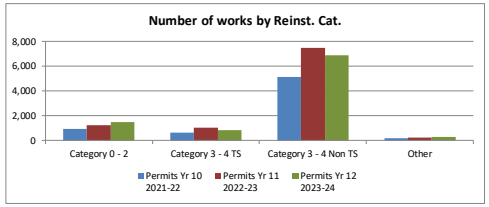


Table A.7: Reinstatement categories

| REINSTATEMENT CATEGORY | Permits Yr 10 2021-22 | Permits Yr 11 2022-23 | Permits Yr 12 2023-24 |
|---|---|---|---|
| Category 0 - 2 | 930 | 1,261 | 1,501 |
| Category 3 - 4 TS | 642 | 1,040 | 865 |
| Category 3 - 4 Non TS | 5,137 | 7,488 | 6,883 |
| Other | 209 | 250 | 280 |
| **All works** | **6,918** | **10,039** | **9,529** |
| **Category 3 - 4 Non TS** | **74%** | **75%** | **72%** |




| Average Yr 7-9, 2018-21 | Average Yr 10-12, 2021-24 | Difference | |
|---|---|---|---|
| 1,139 | 1,231 | 92 | 8% |
| 770 | 849 | 79 | 10% |
| 4,929 | 6,503 | 1,573 | 32% |
| 235 | 246 | 11 | 5% |
| **7,073** | **8,829** | **1,755** | 25% |
| **70%** | **74%** | **90%** | |

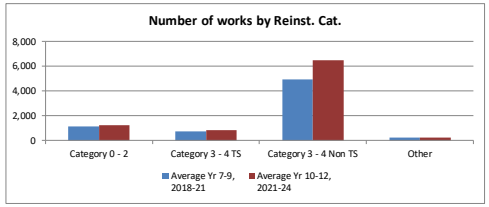
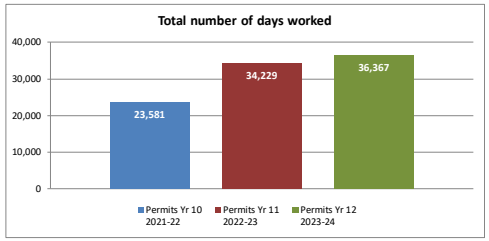
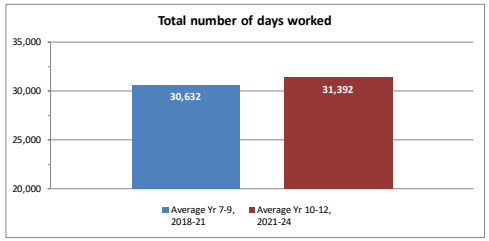



Table A.8: Average works duration

| DURATION | Permits Yr 10 2021-22 | Permits Yr 11 2022-23 | Permits Yr 12 2023-24 |
|---|---|---|---|
| Average duration (days) | 3.4 | 3.4 | 3.8 |
| **Total number of days worked** | **23,581** | **34,229** | **36,367** |
| **Total number of days worked (Permits)** | **23,581** | **34,229** | **36,367** |




| Average Yr 7-9, 2018-21 | Average Yr 10-12, 2021-24 | Difference | |
|---|---|---|---|
| 4.1 | 3.5 | -0.6 | -14% |
| **30,632** | **31,392** | **761** | 2% |
| **15,472** | **31,392** | **15,920** | 103% |



# Highway authority works promoter

**ANNUAL DATA ANALYSIS**

Table A.9: Highway works by tm t

| TRAFFIC MANAGEMENT TYPE | Permits Yr 10 2021-22 | Permits Yr 11 2022-23 | Permits Yr 12 2023-24 |
|---|---|---|---|
| No c/w incursion | 9 | 9 | 84 |
| Some c/w incursion | 28 | 26 | 38 |
| Give & take | 8 | 9 | 22 |
| Priority working | 3 | 1 | 1 |
| Two-way signals | 84 | 72 | 58 |
| Multi-way signals | 47 | 27 | 65 |
| Stop/Go boards | 8 | 6 | 18 |
| Convoy working | 2 | 1 | 1 |
| Lane closure | 93 | 236 | 267 |
| Contra-flow | 1 | 2 | |
| Road closure | 326 | 234 | 258 |
| Temp Obstruction 15min delay | | | |
| **Total** | **609** | **623** | **812** |

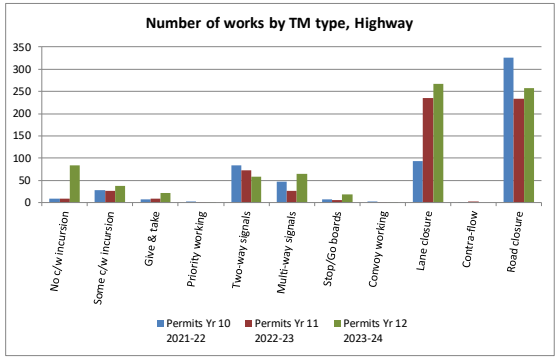
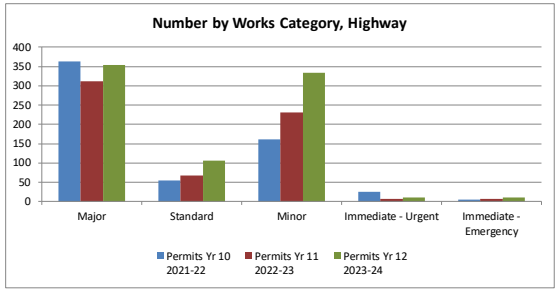



Table A.10: Highway works by works category

| WORKS STOPPED | Permits Yr 10 2021-22 | Permits Yr 11 2022-23 | Permits Yr 12 2023-24 |
|---|---|---|---|
| Major | 363 | 312 | 354 |
| Standard | 55 | 68 | 105 |
| Minor | 161 | 230 | 333 |
| Immediate - Urgent | 25 | 7 | 10 |
| Immediate - Emergency | 5 | 6 | 10 |
| Other | | | |
| **Total** | **609** | **623** | **812** |




**3-YEAR AVERAGE COMPARISON**

Table A.9b: Highway works by tm

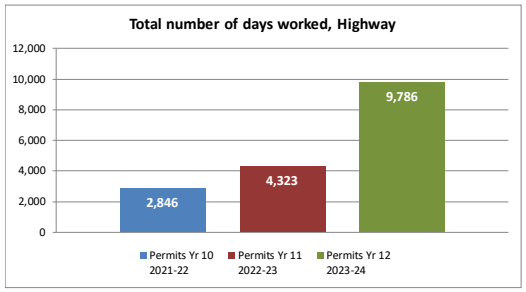
| TRAFFIC MANAGEMENT TYPE | Average Yr 7-9, 2018-21 | Average Yr 10-12, 2021-24 | Difference | |
|---|---|---|---|---|
| No c/w incursion | 119 | 34 | -85 | -71% |
| Some c/w incursion | 157 | 31 | -127 | -81% |
| Give & take | 20 | 13 | -7 | -36% |
| Priority working | 1 | 2 | 1 | 67% |
| Two-way signals | 71 | 71 | 0 | 0% |
| Multi-way signals | 25 | 46 | 22 | 88% |
| Stop/Go boards | 15 | 11 | -4 | -27% |
| Convoy working | 3 | 1 | -2 | -56% |
| Lane closure | 220 | 199 | -21 | -10% |
| Contra-flow | 3 | 1 | -2 | -67% |
| Road closure | 289 | 273 | -17 | -6% |
| Blank | | | | |
| **Total** | **923** | **681** | **-242** | -26% |

Table A.10b: Highway works by works category

| WORKS STOPPED | Average Yr 7-9, 2018-21 | Average Yr 10-12, 2021-24 | Difference | |
|---|---|---|---|---|
| Major | 374 | 343 | -31 | -8% |
| Standard | 122 | 76 | -46 | -38% |
| Minor | 384 | 241 | -143 | -37% |
| Immediate - Urgent | 31 | 14 | -17 | -55% |
| Immediate - Emergency | 9 | 7 | -2 | -22% |
| Other | | | | |
| **Total** | **920** | **681** | **-239** | -26% |

Table A.11: Average works duration, highway works

| DURATION | Permits Yr 10 2021-22 | Permits Yr 11 2022-23 | Permits Yr 12 2023-24 |
|---|---|---|---|
| Average duration (days) | 4.7 | 6.9 | 12.1 |
| **Total number of days worked** | **2,846** | **4,323** | **9,786** |
| **Total number of days worked (Permits)** | **2,846** | **4,323** | **9,786** |




**Permits Year 10, 2021-22**

| MAJOR | STANDARD | MINOR | IMMED. (URGENT) | IMMED. (EMERG.) |
|---|---|---|---|---|
| 11.4 | 7.6 | 3.7 | 2.6 | 4.3 |
| **4,773** | **1,195** | **1,612** | **54** | **39** |

**Permits Year 11, 2022-23**

| MAJOR | STANDARD | MINOR | IMMED. (URGENT) | IMMED. (EMERG.) |
|---|---|---|---|---|
| 8.0 | 2.2 | 1.3 | 2.3 | 6.1 |
| **2,830** | **353** | **436** | **57** | **55** |

**Permits Year 12, 2023-24**

| MAJOR | STANDARD | MINOR | IMMED. (URGENT) | IMMED. (EMERG.) |
|---|---|---|---|---|
| 9.0 | 5.5 | 1.3 | 5.6 | 107.3 |
| **3,169** | **240** | **473** | **263** | **966** |

Table A.11b: Average works duration, highway works

| DURATION | Average Yr 7-9, 2018-21 | Average Yr 10-12, 2021-24 | Difference | |
|---|---|---|---|---|
| Average duration (days) | 5.9 | 7.9 | 2.0 | 34% |
| **Total number of days worked** | **5,505** | **5,652** | **146** | 3% |
| **Total number of days worked (Permits)** | **2,956** | **5,652** | **2,695** | 91% |

## Utility works promoters

**ANNUAL DATA ANALYSIS**

Table A.12: Utility works by tm ty

| TRAFFIC MANAGEMENT TYPE | Permits Yr 10 2021-22 | Permits Yr 11 2022-23 | Permits Yr 12 2023-24 |
|---|---|---|---|
| No c/w incursion | 2,633 | 4,275 | 3,625 |
| Some c/w incursion | 1,449 | 1,934 | 1,814 |
| Give & take | 667 | 518 | 607 |
| Priority working | 27 | 12 | 21 |
| Two-way signals | 462 | 585 | 598 |
| Multi-way signals | 620 | 1,099 | 842 |
| Stop/Go boards | 108 | 379 | 523 |
| Convoy working | | | |
| Lane closure | 56 | 76 | 102 |
| Contra-flow | 3 | 2 | 7 |
| Road closure | 284 | 534 | 563 |
| Temp Obstruction 15min delay | | 2 | 15 |
| **Total** | **6,309** | **9,416** | **8,717** |

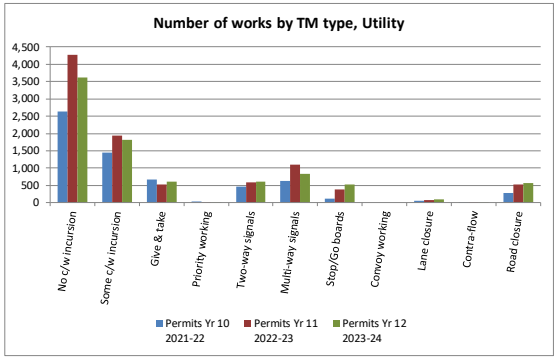
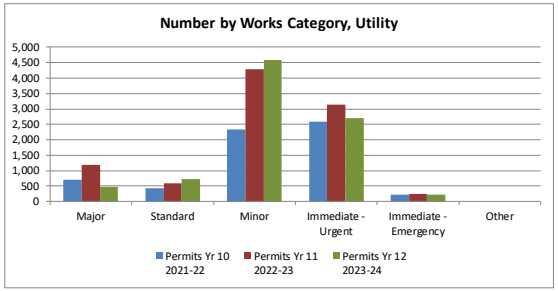



Table A.13: Utility works by works category

| WORKS STOPPED | Permits Yr 10 2021-22 | Permits Yr 11 2022-23 | Permits Yr 12 2023-24 |
|---|---|---|---|
| Major | 709 | 1,179 | 466 |
| Standard | 439 | 578 | 730 |
| Minor | 2,346 | 4,284 | 4,592 |
| Immediate - Urgent | 2,592 | 3,139 | 2,711 |
| Immediate - Emergency | 223 | 236 | 218 |
| Other | | | |
| **Total** | **6,309** | **9,416** | **8,717** |




**3-YEAR AVERAGE COMPARISON**

Table A.12b: Utility works by tm ty

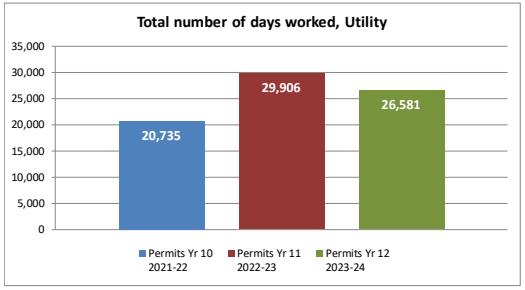
| TRAFFIC MANAGEMENT TYPE | Average Yr 7-9, 2018-21 | Average Yr 10-12, 2021-24 | Difference | |
|---|---|---|---|---|
| No c/w incursion | 1,791 | 3,511 | 1,720 | 96% |
| Some c/w incursion | 2,545 | 1,732 | -813 | -32% |
| Give & take | 618 | 597 | -20 | -3% |
| Priority working | 41 | 20 | -21 | -52% |
| Two-way signals | 506 | 548 | 43 | 8% |
| Multi-way signals | 550 | 854 | 303 | 55% |
| Stop/Go boards | 66 | 337 | 271 | 410% |
| Convoy working | 1 | | -1 | -100% |
| Lane closure | 68 | 78 | 10 | 14% |
| Contra-flow | 6 | 4 | -2 | -27% |
| Road closure | 262 | 460 | 198 | 75% |
| Blank | 301 | 9 | -293 | |
| **Total** | **6,755** | **8,150** | **1,395** | 21% |

Table A.13b: Utility works by works category

| WORKS STOPPED | Average Yr 7-9, 2018-21 | Average Yr 10-12, 2021-24 | Difference | |
|---|---|---|---|---|
| Major | 709 | 785 | 76 | 11% |
| Standard | 477 | 582 | 105 | 22% |
| Minor | 2,346 | 3,741 | 1,395 | 59% |
| Immediate - Urgent | 2,725 | 2,814 | 89 | 3% |
| Immediate - Emergency | 296 | 226 | -70 | -24% |
| Other | | | | |
| **Total** | **6,552** | **8,147** | **1,595** | 24% |

Table A.14: Average works duration, utility works

| DURATION | Permits Yr 10 2021-22 | Permits Yr 11 2022-23 | Permits Yr 12 2023-24 |
|---|---|---|---|
| Average duration (days) | 3.3 | 3.2 | 3.0 |
| **Total number of days worked** | **20,735** | **29,906** | **26,581** |
| **Total number of days worked (Permits)** | **20,735** | **29,906** | **26,581** |




**Permits Year 10, 2021-22**

| MAJOR | STANDARD | MINOR | IMMED. (URGENT) | IMMED. (EMERG.) |
|---|---|---|---|---|
| 12.7 | 5.5 | 1.7 | 3.2 | 4.7 |
| **7,224** | **3,248** | **4,319** | **10,012** | **1,571** |

**Permits Year 11, 2022-23**

| MAJOR | STANDARD | MINOR | IMMED. (URGENT) | IMMED. (EMERG.) |
|---|---|---|---|---|
| 15.1 | 6.1 | 1.7 | 3.3 | 4.2 |
| **7,228** | **2,873** | **3,705** | **8,732** | **1,104** |

**Permits Year 12, 2023-24**

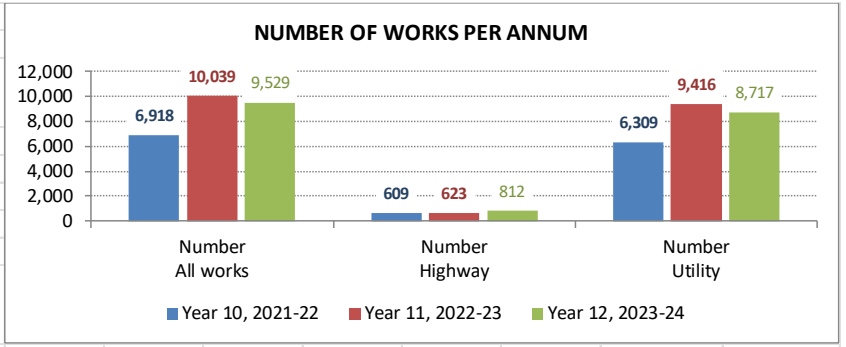
| MAJOR | STANDARD | MINOR | IMMED. (URGENT) | IMMED. (EMERG.) |
|---|---|---|---|---|
| 10.2 | 5.7 | 1.7 | 2.9 | 3.9 |
| **11,006** | **2,161** | **4,013** | **7,027** | **1,156** |

Table A.14b: Average works duration, utility works

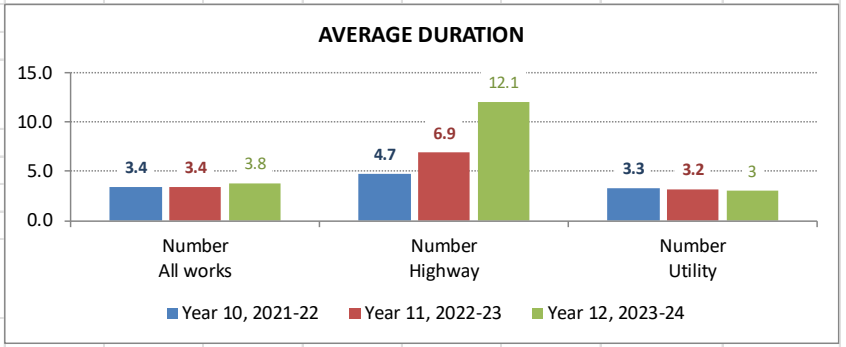
| DURATION | Average Yr 7-9, 2018-21 | Average Yr 10-12, 2021-24 | Difference | |
|---|---|---|---|---|
| Average duration (days) | 3.8 | 3.2 | -0.7 | -17% |
| **Total number of days worked** | **25,126** | **25,741** | **614** | 2% |
| **Total number of days worked (Permits)** | **12,516** | **25,741** | **13,225** | 106% |

## APPENDIX B. SCHEME BENEFIT SUMMARY

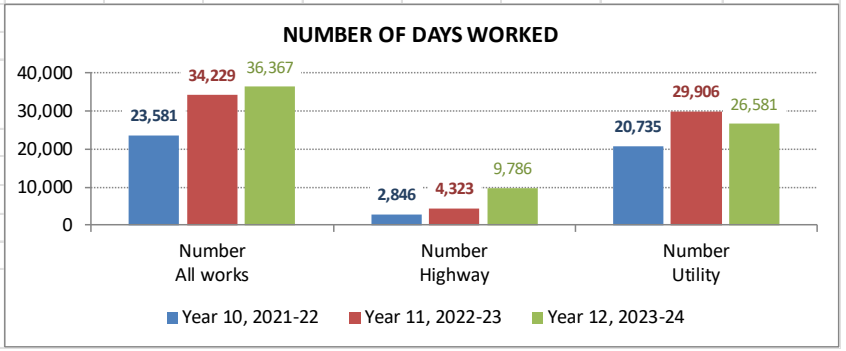
| NUMBER OF WORKS | (number) | | |
|---|---|---|---|
| | Number All works | Number Highway | Number Utility |
| Year 10, 2021-22 | 6,918 | 609 | 6,309 |
| Year 11, 2022-23 | 10,039 | 623 | 9,416 |
| Year 12, 2023-24 | 9,529 | 812 | 8,717 |
| Difference, Yr 12 - Yr 11 | -510 | 189 | -699 |
| Change, Yr 12 - Yr 11 (%) | -5.1% | 30.3% | -7.4% |

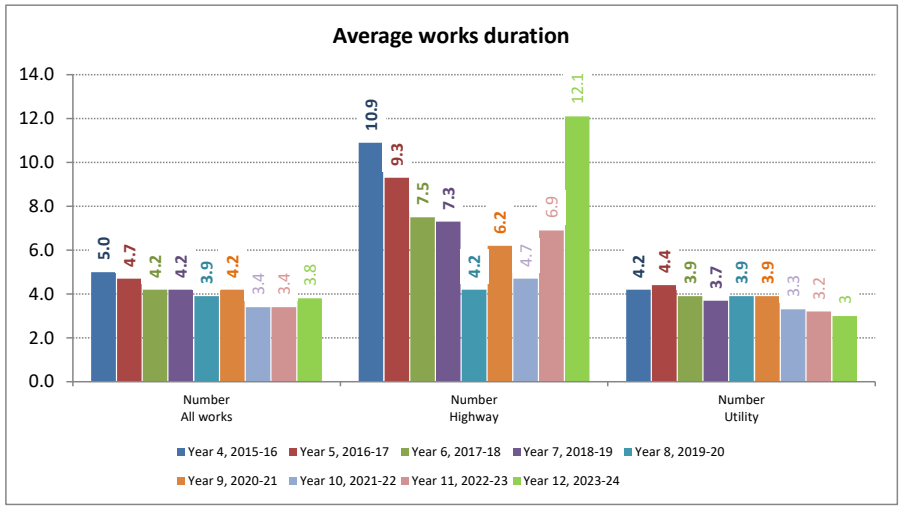


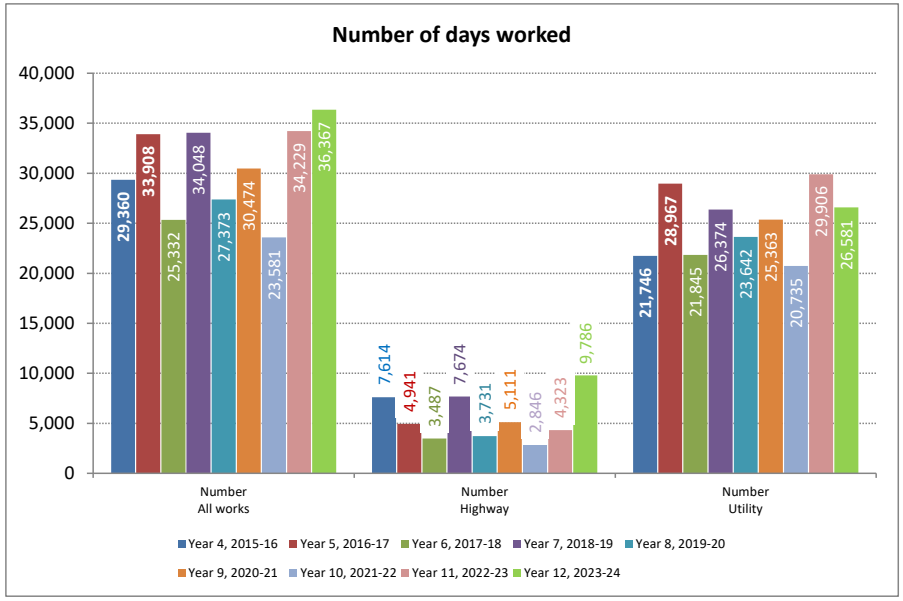

| DURATION | (days) | | |
|---|---|---|---|
| | Average All works | Average Highway | Average Utility |
| Year 10, 2021-22 | 3.4 | 4.7 | 3.3 |
| Year 11, 2022-23 | 3.4 | 6.9 | 3.2 |
| Year 12, 2023-24 | 3.8 | 12.1 | 3 |
| Change, Yr 12 - Yr 11 (%) | 11.8% | 75.4% | -6.3% |




| DAYS WORKED | (days) | | |
|---|---|---|---|
| | Number All works | Number Highway | Number Utility |
| Year 10, 2021-22 | 23,581 | 2,846 | 20,735 |
| Year 11, 2022-23 | 34,229 | 4,323 | 29,906 |
| Year 12, 2023-24 | 36,367 | 9,786 | 26,581 |
| Difference, Yr 12 - Yr 11 | 2,138 | 5,463 | -3,325 |
| Change, Yr 12 - Yr 11 (%) | 6.2% | 126.4% | -11.1% |




Average works duration
14.0
12.0
10.0
8.0
6.0
4.0
2.0
0.0
5.0
4.7
4.2
4.2
3.9
4.2
3.4
3.4
3.8
10.9
9.3
7.5
7.3
4.2
6.2
4.7
6.9
12.1
4.2
4.4
3.9
3.7
3.9
3.9
3.3
3.2
3
Number
All works
Number
Highway
Number
Utility
Year 4, 2015-16
Year 5, 2016-17
Year 6, 2017-18
Year 7, 2018-19
Year 8, 2019-20
Year 9, 2020-21
Year 10, 2021-22
Year 11, 2022-23
Year 12, 2023-24


Number of days worked
40,000
35,000
30,000
25,000
20,000
15,000
10,000
5,000
0
29,360
33,908
25,332
34,048
27,373
30,474
23,581
34,229
36,367
7,614
4,941
3,487
7,674
3,731
5,111
2,846
4,323
9,786
21,746
28,967
21,845
26,374
23,642
25,363
20,735
29,906
26,581
Number
All works
Number
Highway
Number
Utility
Year 4, 2015-16
Year 5, 2016-17
Year 6, 2017-18
Year 7, 2018-19
Year 8, 2019-20
Year 9, 2020-21
Year 10, 2021-22
Year 11, 2022-23
Year 12, 2023-24