

# **Commuted sums for Highway Adoption A Guidance Note**



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Produced for the London Transport Asset Management Board on behalf of the London Technical Advisors Group by LB Islington



### 1. Introduction

- 1.1 Commuted sums are financial contributions made by third parties to Highway Authorities as compensation for taking on the future maintenance responsibility for newly created highways or highway improvements. They are typically, although not invariably, secured through legal agreements made with developers and landowners under Sections 38 and/or 278 of the Highways Act 1980 ("the 1980 Act").
- 1.2 Historically, commuted sum practice has been variable but with Highway Authorities' maintenance budgets increasingly reduced, there is a growing trend for Highway Authorities to minimize their financial exposure by securing full recompense for liabilities arising out of new or improved highways.
- 1.3 The 1980 Act contains wide powers allowing Authorities to do this by securing contributions from third parties for the future maintenance of highways.
- 1.4 A recent court case ("the Redrow case")<sup>1</sup> confirms that it is appropriate for Authorities to use these powers to seek commuted sums for all elements of future highway maintenance.
- 1.5 The calculation of the commuted sum is the subject of individual agreements. This note sets out a common approach as to how the commuted sum can be calculated.
- 1.6 It should be noted, that the adoption of new roads may be associated with development or regeneration schemes that are of benefit to the community. Therefore a reasonable approach should be adopted when considering the scope and scale of the items including in the calculation of a commuted sum.

#### 2. The Legal Background

2.1 Highway Authorities can agree to adopt new roads and secure improvements to existing roads under Sections 38 and 278 of the 1980 Act.

#### New roads adopted under Section 38

2.2 Section 38 is a power allowing Highway Authorities to adopt newly constructed roads by agreement with landowners and developers. Section 38(6) states as follows:

"An agreement under this section may contain such provisions as to the dedication as a highway of any road or way to which the agreement relates, the bearing of the expenses of the construction, maintenance or improvement of any highway, road, bridge or viaduct to which the agreement relates and other relevant matters as the authority making the agreement think fit".

- 2.3 The Court of Appeal considered Section 38(6) in the recent Redrow case, ruling that it is a wide and unqualified power permitting Highway Authorities to secure commuted sums for all future maintenance costs associated with the highway works in question.
- 2.4 The Court of Appeal emphasised the wide and unqualified nature of the Section 38(6) power. A key consequence of the case is its recognition that there are no

<sup>&</sup>lt;sup>1</sup> R (Redrow Homes Ltd) v Knowsley MBC [2015] 1 WLR 386



limitations contained in Section 38(6) as to how the amount of the commuted sum should be calculated.

2.5 Section 38 commuted sums need not therefore be limited, as is occasionally argued by developers, to "extra over" costs ie the costs of maintaining "non-standard" construction or construction which utilises specialist materials or exceptional items, features or specifications.

#### Existing roads improved under Section 278

2.6 Section 278 of the 1980 is a power allowing Highway Authorities to secure improvements to existing roads by agreement with landowners and developers. Section 278(3) states as follows:

"The agreement may also provide for the making to the highway authority of payments in respect of the maintenance of the works to which the agreement relates and may contain such incidental and consequential provisions as appear to the highway authority to be necessary or expedient for the purposes of the agreement".

- 2.7 Section 278 is therefore drafted in the same wide and unqualified terms as Section 38 of the 1980 Act. It follows that the same interpretation can be placed on Section 278(3) as for Section 38(6), namely that there are no limitations contained in Section 278(3) as to how the amount of the commuted sum should be calculated. Section 278 commuted sums need not therefore be limited to "extra over" costs but can be calculated by reference to all future maintenance costs.
- 2.8 Having received funding for future maintenance, these sums should be ring fenced by the Highway Authority to be expended in accordance with the Section 38 or Section 278 agreement.

#### 3. What is included in the 'Highway'

- 3.1 For the purposes of adoption, the highway includes all surfacing, bridges, tunnels, drainage, lighting and all objects legitimately located in or on the highway with the permission of the highway authority.
- 3.2 The highway should have clearly marked or agreed and recorded boundaries. Within those boundaries, all elements that the highway authority will assume liability for can be included in the agreement. However the comments in 1.6 may be applied.
- 3.1 For the purposes of adoption, the highway includes all works and activities related to the construction and maintenance of all relevant carriageway, footway, roundabouts, bridges, subways, tunnels, cycle tracks, refuges, verges, culverts, ditches, walls, lighting, signalling, fences/gates, planning/landscaping and drainage/sewerage and all objects legitimately located in or on the highway with the permission of the Highway Authority.
- 3.2 The highway should have clearly marked or agreed and recorded boundaries. Within those boundaries, all elements that the highway authority will assume liability for can be included in the agreement



#### 4. What is Maintenance?

- 4.1 The Highway Authority has a statutory responsibility for the maintenance and management of adopted highways within its administrative area, including a responsibility for keeping the highway safe for users. This duty extends beyond the surface and includes the "structure and fabric" of the highway. Under Section 56 of the 1980 Act, individuals may enforce this duty by alleging that the highway is "out of repair".
- 4.2 When a highway is adopted, the Highway Authority therefore takes on full responsibility for it. This responsibility is not limited to the physical maintenance of the asset by cleaning, repairing and replacing. It includes potential liability to defend claims for breach of statutory duty and negligence. This means that there is a need to have in place an inspection and recording regime.
- 4.3 Table 1 indicates some of the items that may be relevant when determining the future costs likely to be incurred by the Highway Authority when adopting or agreeing improvements to a road.

Activity	Туре
Gulley emptying	Routine
Energy costs	Routine
Sign washing	Routine
Tree inspection	Routine
Tree maintenance	Routine
Grounds maintenance	Routine
Structural inspections	Routine

Lighting equipment	Works
Street furniture	Works
Marking & Lining	Works
Structures	Works
Carriageway surface	Works
Carriageway base	Works
Kerbs & Channels	Works
Gullies	Works
Drainage	Works
Footway surface	Works

 Table 1. Potential Maintenance items



# 5. The Commuted Sum

- 5.1 A commuted sum is a single payment that is invested over an agreed period. From this sum, the cost of maintenance is drawn down and at the end of the agreed period the commuted sum is 0
- 5.2 To calculate the sum the following amounts are considered:

# Works

The current replacement cost of the elements being adopted (NPV) The design life of the elements (D) The rate of investment return (i) The rate of inflation of the maintenance works (a) The agreed period of the commuted sum (n)

# Service

Present costs of services such as cleansing, inspecting, grass cutting, energy etc.

# The approach

The current replacement cost is the net present value NPV The base year maintenance works cost is the NPV/Design life The base year routine works cost is the cost of routine maintenance/frequency in years

## 5.3 Commuted Sum Formula

C=Commuted sum NPV = cost of the works at net present value D=Design life in years Y=commuted term in years a=Inflation rate for maintenance % i=Investment rate for the commuted sum %



The formula translates into a spread sheet and examples are shown in Appendix 1

#### Figure 1. commuted sum formula



#### 6. Interest rates

6.1 Setting the interest rates for calculating the commuted sum should be agreed based on the available forecasts. For public sector interest forecasts the UK Treasury and the Bank of England publish long term predictions. Construction costs can be projected from the Civil Engineering sector of the Building Construction Information Service or similar reports.

## 7. Payment Time

- 7.1 Payment of the commuted sum should be incorporated into the handover process and a typical procedure is set out below:
- 7.2 During the works it is assumed that the Highways Authority has carried such inspections required to satisfy the Authority that the correct materials & workmanship have been used.
- 7.3 Before the highway is opened to the public, it will be jointly inspected by the Highways Authority and the Developer\*; subject to any remedial works, a provisional certificate of completion will be issued.
- 7.4 The defect correction period then follows, during this period the highway will remain the liability of the Developer and will be maintained by the Developer or their servants. This period will not be less than 12 months.
- 7.5 At the end of this period a further inspection will take place and after any further remedial work, the commuted sum will be paid in full. A final certificate will be issued and the highway will become public highway. No certificate or final adoption will take place until the commuted sum is paid.

\*Developer is used to mean any person(s) offering the highway for adoption under an appropriate agreement.



# Appendix 1

# Example 1 Highway

#### **Basic Data**

Investment Interest rate %	2%
Maintenance cost rise %	2.50%
Commuted period (yrs)	25
•	

### The Activities

Activity	Туре	Frequency ( Yrs)	£NPV	£Base Year Cost	Commuted Sum
Gulley emptying	Routine	1	500	500	£13,828.71
Energy costs	Routine	1	100	100	£2,765.74
Sign washing	Routine	3	80	27	£737.53
Tree inspection	Routine	3	75	25	£691.44
Tree maintenance	Routine	1	100	100	£2,765.74
Grounds maintenance	Routine	1	100	100	£2,765.74
Structural inspections	Routine	2	250	125	£3,457.18
		Design Life (Yrs)			
Lighting equipment	Works	30	30000	1000	£27,657.41
Street furniture	Works	30	8000	267	£7,375.31
Marking & Lining	Works	20	9000	450	£12,445.84
Structures	Works	120	220000	1833	£50,705.26
Carriageway surface	Works	20	105000	5250	£145,201.42
Carriageway base	Works	40	120000	3000	£82,972.24
Kerbs & Channels	Works	40	45000	1125	£31,114.59
Gullies	Works	60	30000	500	£13,828.71
Drainage	Works	60	1000	17	£460.96
Footway surface	Works	25	95000	3800	£105,098.17

£663,000.00 £18,218.33 £503,871.97

 Table 2.
 Life time Maintenance

The commuted sum is £503,871.97 The Base year maintenance cost is £18,218.33



# The Commuted Fund Projection

Year	Fund	Maintenance	Balance	600,000.00	1
		Cost			
0	503,871.97	18,218.33	485,653.63		£Balance
1	495,366.71	18,673.79	476,692.91		
2	486,226.77	19,140.64	467,086.14	500 000 00	
3	476,427.86	19,619.15	456,808.71	300,000.00	
4	465,944.88	20,109.63	445,835.25		
5	454,751.95	20,612.37	434,139.58		
6	442,822.37	21,127.68	421,694.69		
7	430,128.59	21,655.87	408,472.71	400,000.00	
8	416,642.17	22,197.27	394,444.90		
9	402,333.79	22,752.20	379,581.59		
10	387,173.22	23,321.01	363,852.22		
11	371,129.26	23,904.03	347,225.23	300,000.00	
12	354,169.73	24,501.63	329,668.10		
13	336,261.46	25,114.17	311,147.29		
14	317,370.24	25,742.03	291,628.21		
15	297,460.77	26,385.58	271,075.19	200,000.00	
16	276,496.70	27,045.22	249,451.48		
17	254,440.51	27,721.35	226,719.16		
18	231,253.54	28,414.38	202,839.16		
19	206,895.94	29,124.74	177,771.20	100 000 00	
20	181,326.63	29,852.86	151,473.77	100,000.00	
21	154,503.24	30,599.18	123,904.06		
22	126,382.14	31,364.16	95,017.98		Ι
23	96,918.34	32,148.27	64,770.07		Ι
24	66,065.47	32,951.97	33,113.50	0.00	
25	33,775.77	33,775.77	0.00	Year	U Z 4 6 8 10 12 14 16 18 20 22 24

 Table 3. Commuted sum profile



# Example 2 Structure

### Basic Data

Investment Interest rate %	2.50%
Maintenance cost rise %	3.20%
Commuted period (yrs)	40

#### The Activities

Activity	Туре	Frequency ( years)	£NPV	Base Year Cost £	Commuted Sum
General Inspection	Routine	2	300	50	£2,510.89
Principle Inspection	Routine	6	500	83	£4,184.82

		Design Life (Yrs)			
Bridge Maintenance	Works	120	1400000	11667	£585,875.37
Capital Works value			£1,400,000.00	£11,800.00	£592,571.09

 Table 4. Life time Maintenance

The commuted sum is £592,571.09 The Base Year maintenance cost is £11,800



#### **The Commuted Fund Projection**

Year	Fund	Cost	Balance
0	592571.09	11800.00	580771.09
1	589482.66	12095.00	577387.66
2	586048.47	12397 38	573651 10
2	582255 86	12337.30	5695/18 55
у 	578001 78	12/07.51	565066 79
	572542.70	12250.62	560102.17
5	573542.79	13530.02	500192.17
7	508393.00	14026 40	534910.07
/ 0	505254.55	14020.49	549207.84
0	557445.90	14577.15	545008.81
9	551214.84	14/30.58	530478.25
10	544525.43	15105.00	529420.43
11	53/361./4	15482.62	521879.11
12	529707.30	15869.69	513837.61
13	521545.18	16266.43	505278.75
14	512857.93	16673.09	496184.84
15	503627.61	17089.92	486537.69
16	493835.76	17517.17	476318.59
17	483463.37	17955.10	465508.27
18	472490.90	18403.97	454086.93
19	460898.23	18864.07	442034.16
20	448664.67	19335.67	429329.00
21	435768.93	19819.07	415949.86
22	422189.11	20314.54	401874.57
23	407902.69	20822.41	387080.28
24	392886.49	21342.97	371543.52
25	377116.67	21876.54	355240.13
26	360568.73	22423.45	338145.28
27	343217.46	22984.04	320233.42
28	325036.92	23558.64	301478.28
29	306000.45	24147.61	281852.85
30	286080.64	24751.30	261329.34
31	265249.28	25370.08	239879.20
32	243477.39	26004.33	217473.06
33	220735.15	26654.44	194080.71
34	196991.92	27320.80	169671.12
35	172216.19	28003.82	144212.37
36	146375.56	28703.92	117671.64
37	119436.71	29421.51	90015.20
38	91365.43	30157.05	61208.37
39	62126.50	30910.98	31215.52
40	31683.75	31683.75	0.00



Table5. Commuted Sum profile