

Barnsley Council

Commuted Sums Payments for Future Maintenance in
Relation to Adoption and Transfer of Infrastructure
Assets

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1. Introduction

- 1.1 The purpose of this policy is to clearly define when a commuted sum will apply and how the commuted sum is calculated so that a clear and consistent understanding is achieved when entering into future highway adoption agreements with developers.
- 1.2 This document aims to provide a transparent and consistent approach to the seeking of and calculation of Commuted Sums for developer / third party funded highway assets in Barnsley. The guidance outlines the clarity of approach in order to:
 - Remove uncertainty and risk for developers at an early stage in the process
 - Provide greater scrutiny for overstretched highway budgets
 - Enable developments to progress with much more certainty about the overall requirements and commitments for all parties involved
 - Provide a more flexible approach to the adoption of new and alternative “non-standard” layouts without stifling innovation and the desire to create better places to live
- 1.3 The principles adopted by this policy follow the guidance contained within the County Surveyors Society (CSS) (now known as Directors of Environment, Economy, Planning and Transport (ADEPT)) guidance document “Commuted Sums for Maintaining Infrastructure Assets” (2009). Within this document, the suggested legal definition for the term “Commuted Sum” in relation to the adoption of new infrastructure is:

A payment of a capital sum by an individual, authority or company to the Highway Authority, Local Authority or other body as a contribution towards the future maintenance of the asset to be adopted or transferred.
- 1.4 For each and every length of newly adopted highway, a consideration is made by central government to provide additional funding to the Highway Authority for the future maintenance of these roads (the Revenue Support Grant – RSG) The amount of this funding is based purely on the additional length of carriageway and does not allow for the increased maintenance burden associated with “non standard” construction types or materials.
 - “Non standard” in this instance is defined as all construction types or materials that are not included in the following definition of “standard construction”. See Section 6 for details of Standard Construction definitions.
- 1.5 The calculation of commuted sum(s) is the subject of individual agreements, however, this policy sets out the framework as to how and why commuted sums are calculated and applied.

2. Background

- 2.1 The Council, as Highway Authority has a statutory responsibility for the management and maintenance of the highway network which includes the need to keep the network safe for all road users.
- 2.2 Highway assets and infrastructure delivered by developers are continually transferred to the Council as the highway authority through legal agreements securing “adoption”, whereby the Highway Authority then assumes responsibility for its future maintenance. When the Highway Authority takes on assets from other owners, it incurs maintenance costs for the life of the assets, as well as replacement costs at the end of their useful life
- 2.3 The rationale for seeking commuted sums is to ensure that highway authorities have sufficient financial resources to fund the future maintenance, associated works and, where appropriate, replacement of these additional assets, for which any funding received from Government through the Revenue Support Grant (RSG) is insufficient.
- 2.4 The purpose of this policy is to ensure that, when accepting assets from other owners, the Highway Authority is not unnecessarily burdened with maintenance and replacement costs. It does this by allowing for commuted sums for maintenance to be recovered through Section 38 or section 278 agreements. The statutory authority for these payments is covered under section 38(6) and section 278(3) of the Highways Act 1980.
- 2.5 Barnsley Council has increasing pressure on its budget, which has resulted in the need for commuted sums to cover the cost of maintaining additional highway facilitating a development and the costs in maintaining new roads offered for adoption.

3. Legal Background

- 3.1 There are three main ways in which the Highway Authority agrees to take on assets from other owners:
 - S38 Agreement (of the Highways Act 1980), whereby the total length of adopted highway maintained by the Highway Authority is extended. This affects the formulae that govern the calculation of the RSG, which includes for general highway maintenance.
 - S278 Agreement (of the Highways Act 1980). As these works are on the existing maintainable highway, it is less likely that there will be an extension to the network and therefore it is unlikely to affect the RSG.
 - Other agreed transfers from third parties. These may or may not extend the existing highway, depending on the circumstances.

New Roads adopted under Section 38

- 3.2 Section 38 of the Highways Act 1980 (“the Act”) 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".

This relates not only to the "maintenance" prior to adoption but also "relevant matters as the authority making the agreement thinks fit", which may include a commuted sum for future maintenance following adoption.

- 3.3 The Court of Appeal has emphasised the wide and unqualified nature of Section 38(6) powers. There are no limitations as to how the commuted sum should be calculated (Redrow Homes Ltd v Knowsley MBC 2015) and this need not be limited to "extra over" costs.

Existing Roads improved under Section 278

- 3.4 Section 278 of the Act is a power allowing highway authorities to secure improvements to existing roads by agreement with landowners and developers. Section 278(3) gives an express provision for payments for the maintenance of highway works and 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"

- 3.5 Section 278 is therefore drafted in the same wide and unqualified terms as Section 38 of the Act
- 3.6 Regardless of the potential offer of a commuted sum payment, the highway authority will retain discretion as to what it is prepared to adopt, particularly where a proposal may not be acceptable in principle (e.g. on the grounds of highway safety) or where it would be inappropriate for it to do so (e.g. street art, play areas) or where materials are considered to be unacceptable or to an inappropriate specification.

4. Application

4.1 The need for paying commuted sums can be divided into four broad categories:

- The cost of maintaining areas and construction, which under our normal design guidance are not required for the safe and satisfactory functioning of the highway. Examples are additional areas of carriageway, such as a "square" surrounding a turning head, hard landscaping, grass verges and so on.
- The cost of maintaining some features of the adoptable works which can be considered as Extra Over. Examples include highway structures, public transport infrastructure, landscaping, trees, shrubs etc, additional or non-usual street furniture and noise fencing. These costs represent an increase in our future maintenance liability which will be more than the anticipated normal funding generated by the development.
- The additional cost of maintaining permitted alternative materials and features which are Extra Over. Examples include surfacing materials and street lighting equipment. These additional costs are in excess of what we would have incurred if the materials and features used had been to standard specification.

Agreement, Bond and Timing

4.3 The legal Agreement will include conditions requiring the payment of commuted sums and specify when such payments will need to be made. Any commuted sums payable will be included in the bond required under the Section 38 or Section 278 agreement. The commuted sum will be payable before we issue the adoption / final certificate.

4.4 For Section 278 works, we will not normally apply commuted sums for the existing area of carriageway unless replaced with a non-standard material (in that case, the commuted sum would be the difference between the commuted sum for the standard and non-standard material). A full commuted sum would be required for any additional carriageway created (e.g a right turn lane) or any new feature (e.g. refuge / splitter island, additional lighting, bollards etc). This is because the additional carriageway and features created above those already existing are only required to provide the access for the new development and therefore it is reasonable to require a commuted sum to maintain them in the future

5. Commuted Sum Calculation

- 5.1 All commuted sums secured are discounted to allow for the fact that they will be earning interest which will make up part of the maintenance payment when it is required. It is therefore necessary to determine the net present value of a future expense, and the following formula is used to calculate the maintenance obligation:

$$\text{Commuted sum} = \Sigma \mathbf{Mp} / (1 + \mathbf{D}/100)^{\mathbf{T}}$$

Where **Mp** = Estimated periodic maintenance cost

D = Discount rate (effective annual interest rate) (%)

T = Time period before expenditure will be incurred

- 5.2 **Maintenance Unit Costs (Mp)** are generally based on a "whole life" costing approach with the frequency of inspection, treatment, and/ or the intervals of replacement based on planned frequencies or historic information. It may also be appropriate to add an agreed percentage to the works costs to cover the highway authority design and supervision costs.
- 5.3 Therefore, the associated activities / functions that may be included in the calculation of commuted sums are as follows:
- Inspections and surveys
 - Routine and cyclic maintenance
 - Winter maintenance
 - Energy charges
 - Design and supervision fees
 - Asset replacement
- 5.4 The maintenance costs are based on term maintenance contract rates and staff hourly rates at the time of calculation.
- 5.5 **Discount Rate (D)** is worked out as follows:

$$D = (1.045 / 1.0225) - 1 = 2.2\%$$

Where

1.045 is the interest rate (4.5% based on long term neutral base rate)

1.0225 is the inflation rate (2.25% based on the RPI-X (RPI – mortgage payments))

*** subject to review / change based on economic factors*

- 5.6 This formula ensures that both the interest earned on the commuted sum, and the effect of inflation in increasing the cash sums eventually required are taken into account.

5.7 **Time period (T)** A time period of 60 years is used as the default period for calculating commuted sums for future maintenance, with the exception of highway structures when 120 year will apply, in accordance with the standard design life requirement.

5.8 Commuted sum example:

Annual maintenance cost for example £100

Replacement cost for example £500

Design life for example 20 years

Discount rate 2.2% (0.022)

Calculate for each year up to 60 years including replacement cost as required:

Year 1 - $£100 \div (0.022\% + 1)^1 = £97.85$

Year 2 - $£100 \div (0.022\% + 1)^2 = £95.74$

Year 3 - $£100 \div (0.022\% + 1)^3 = £93.72$ and so on up to year 20

Year 20 - $£500 \div (0.022\% + 1)^{20} = £323.56$

Year 21 - $£100 \div (0.022\% + 1)^{21} = 63.32$ and so on up to year 40

Year 40 - $£500 \div (0.022\% + 1)^{40} = £209.38$

Year 41 - $£100 \div (0.022\% + 1)^{41} = £40.97$ and so on up to year 60

Year 60 - $£500 \div (0.022\% + 1)^{60} = £135.49$

Each value for each year is then summed.

6. Standard Highway Construction Definition

6.1 "Standard" highway construction in Barnsley is defined as follows:

- Carriageways surfaced in concrete asphaltic materials (non-pigmented binder and non-coloured aggregates)
- Carriageways in shared surface roads, courtyards and housing squares surfaced in 200mm x 100mm x 60mm rectangular concrete block paving
- Footway surfaced in concrete asphaltic materials (non-pigmented binder and non-coloured aggregates)
- Hard Margins adjacent to block paved carriageways also surfaced in 200mm x 100mm x 60mm rectangular concrete block paving
- Cycleways surfaced in concrete asphaltic materials
- Pre-cast concrete kerbing
- Gully drainage, connection pipes and gravity draining highway carrier drains.
- Galvanised pedestrian guard railing.
- Standard highway lighting layouts, columns and lanterns.
- Standard illuminated and non-illuminated highway signs.
- Passively safe sign posts where required for road safety.
- Bollards and markers posts manufactured from Plastic derivatives or recycled plastic/rubber.
- Road markings.

6.2 "Non-Standard" is defined as all construction types or materials that are not included in the definition of "standard" construction as above.

7. Commuted Sums

The following items within the Barnsley borough that incur a requirement for commuted sums are:

Traffic Signals	Commuted Sum
Traffic signal junction / Pedestrian Crossing	Actual sum depend upon detail
CCTV camera infrastructure	Actual sum depend upon detail.
Traffic Counting device	Actual sum depend upon detail.
Traffic and Road Safety	Commuted Sum
Gateway features	To be determined on a site by site basis
Raised Tables	To be determined on a site by site basis
Chicane	To be determined on a site by site basis
Speed cushion	To be determined on a site by site basis
Over-run areas to roundabout (granite setts)	To be determined on a site by site basis
Over-run areas to speed control bends	To be determined on a site by site basis
Mini roundabouts	To be determined on a site by site basis
Illuminated Traffic Signs	To be determined on a site by site basis
Non Illuminated Traffic Signs	To be determined on a site by site basis
Vehicle Activated Signs	Whole life costs including replacement
Drainage	Commuted Sum
Gullies	Annual maintenance costs over a 60 year period
Soakaways	Annual maintenance costs over a 60 year period
Retention ponds	Annual maintenance costs over a 60 year period
Hydrobrakes	Annual maintenance costs over a 60 year period
Petrol & Oil Interceptors	Annual maintenance costs over a 60 year period
Other SuDs features (subject to adoption)	Annual maintenance costs over a 60 year period
Connection to highway drains	Additional annual maintenance costs to reflect increased liability
Jetting	To be determined on a site by site basis
Gully Emptying	To be determined on a site by site basis
Combined Kerb Drainage	To be determined on a site by site basis
Green Landscaping	Commuted Sum
Tree	To cover cost of pruning per tree *for a defined period
Hedges	Annual maintenance cost per sqm
Soft Landscaping	Annual maintenance cost per sqm
Verge Maintenance	Annual maintenance cost per sqm
Weed Spraying	To be determined on a site by site basis
Tree Grills	To be determined on a site by site basis
Planters and Raised Beds	Annual maintenance cost per sqm
Earthwork Environmental Bunds	Annual maintenance cost per sqm

Bridges & Structures	Commuted Sum
Attenuated highway drainage system	Whole life costs including replacement after 120 years
Bridges	Whole life costs including replacement after 120 years
Culverts & trash screens	Whole life costs including replacement after 120 years
Retaining Walls	Whole life costs including replacement after 120 years
Head walls	Whole life costs including replacement after 120 years
Sign/signal gantries & cantilever road signs	60 year life – maintenance and replacement
Street Lighting	Commuted Sum
Non-standard columns	Dependent upon type
Non-standard fixings	Dependent upon type
Illuminated street furniture	Dependent upon type
High lighting mast	Dependent upon type
Street Lighting Bulk Lamp Cycle	Dependent upon type
Surfacing	Commuted Sum
Surface Dressing	Overlay per sqm
Hot or cold applied coloured surfacing and high friction surfacing	Overlay per sqm
Modular/Tegula paving	To be determined on a site by site basis
Footways / Cycleways inc PRow	Commuted Sum
Hot or cold applied coloured surfacing and high friction surfacing	Overlay per sqm
Pigmented / Decorative surfacing	To be determined on a site by site basis
Modular/Tegula paving	To be determined on a site by site basis
Conservation kerbs / slabs	To be determined on a site by site basis
Tactile Paving	To be determined on a site by site basis
Kerbs	Commuted Sum
Conservation type kerbs	To be determined on a site by site basis
Fencing & barriers	Commuted Sum
Vehicle Restraint System (VRS)	Replacement
Acoustic Fencing	Dependent on type
Non-standard pedestrian guard railing	Dependent on type
Knee rail fencing	Replacement
Boundary fencing	Dependent on type
Street furniture	Commuted Sum
Bollards	Dependent on type
Retro reflective bollards	Dependent on type
Marker posts	Dependent on type
Cycle Stand	Dependent on type
Litter Bin	Dependent on type
Seating	Dependent on type
Public Transport	Commuted Sum

Bus Shelters	To be determined on a site by site basis
Real Time Information	To be determined on a site by site basis

- 7.1 This list is not exhaustive but reflects the most common occurrences of commuted sums being required, and the developer/consultant is advised to approach the Highway Authority at an early stage to agree when a commuted sum will be required.
- 7.2 It may be that we do not know the full cost implications of the site at this stage; therefore, we will calculate the final value immediately before we adopt the development. The agreement will contain provision for re-calculating commuted sums based on actual quantities used, and a price fluctuation factor specified within the agreement. The 'provisional' commuted sum will be included in the bond requirement under the S38/S278 but will be taken out of the inspection fee calculation. The actual commuted sum will be payable before the Highway Authority agree to issue the Adoption / Final Certificate.