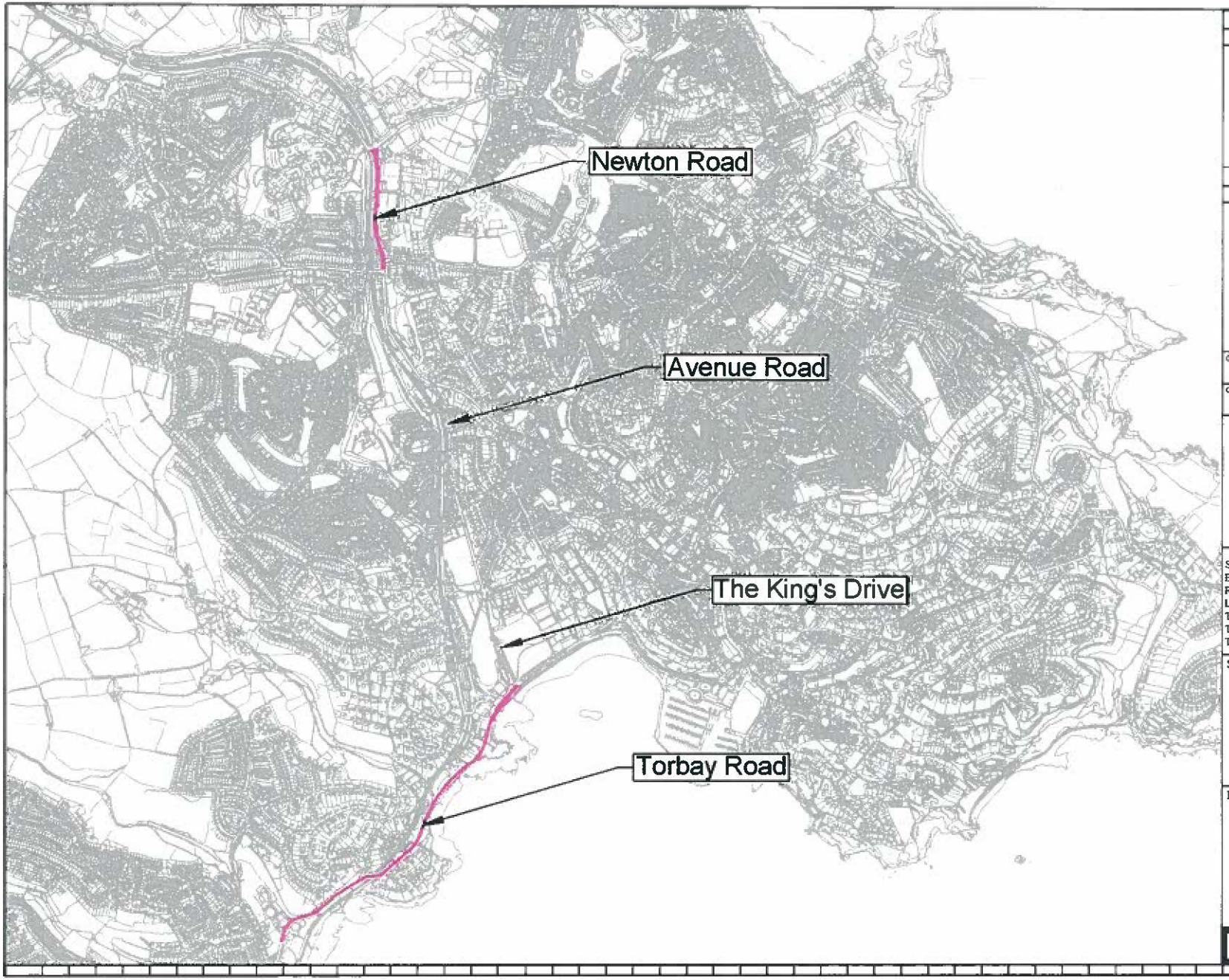
Appendix A

Location Plans Showing Route and SCANNER Survey Data

The magenta areas on the location plan show the composite road construction.

The colours on the SCANNER plans show the surveyed carriageway condition.
Of particular note are the areas shown as red and yellow indicating problems at that location.



REVISIONS		
no.	date	details

NOTES	
no.	details
1.	Areas of Concrete

drawn: LS	scale(s): NTS
checked: TN	date: JANUARY 2014

TORBAY COUNCIL

SUE CHERITON
EXECUTIVE HEAD,
RESIDENTS & VISITOR SERVICES,
LOWER GROUND FLOOR,
TOWN HALL,
TORQUAY
TQ1 3DR

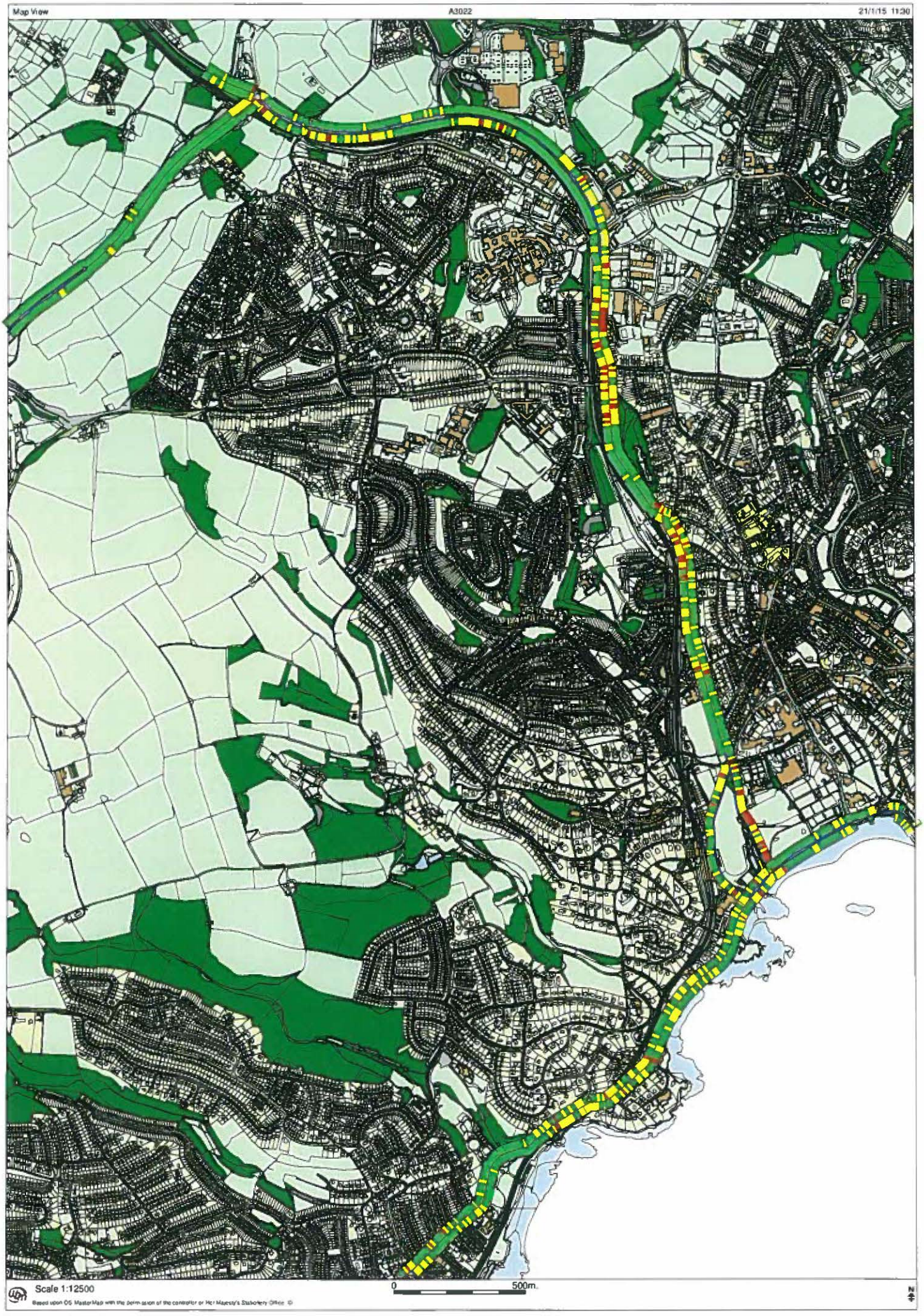
SCHEME TITLE

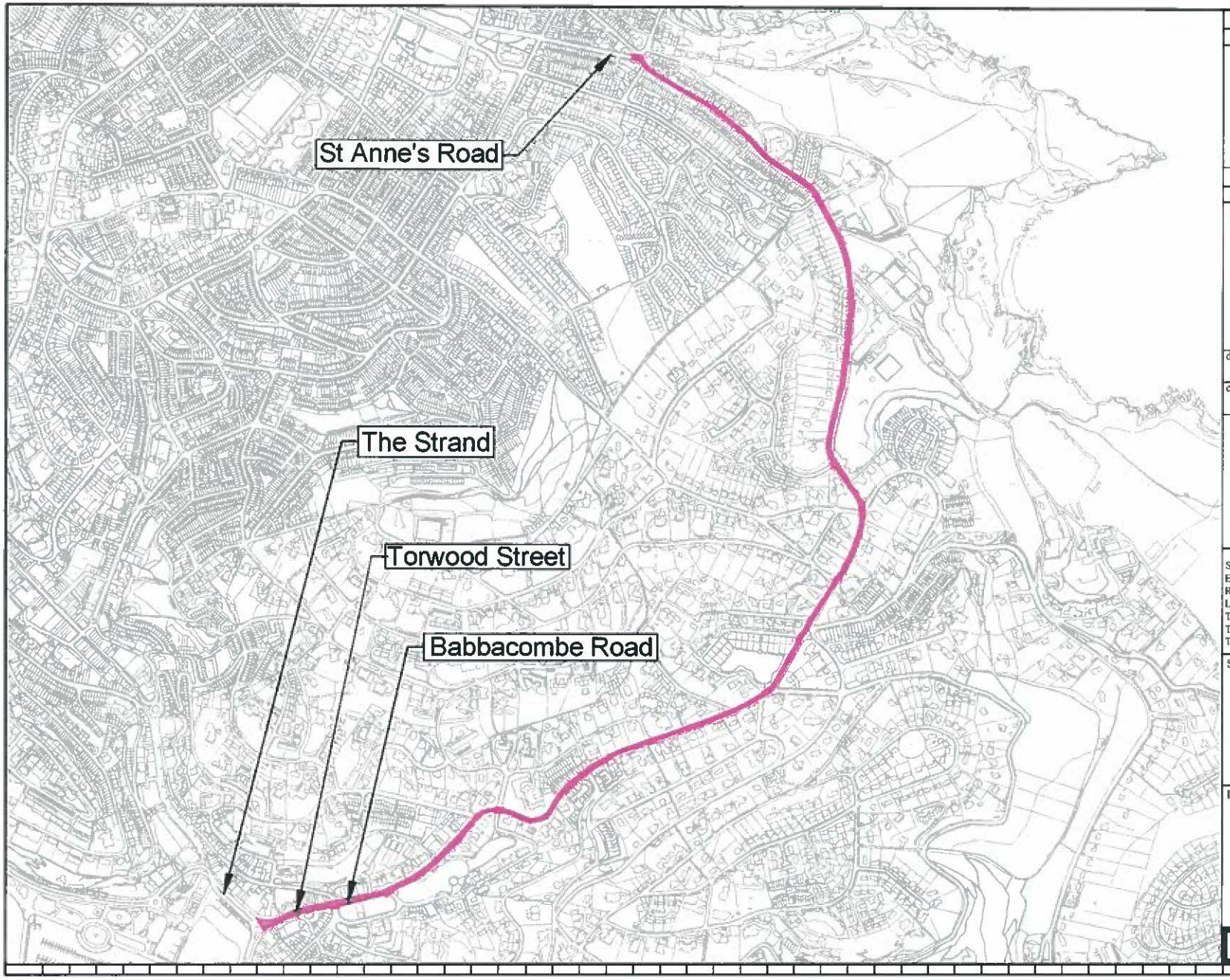
Dft Highways Maintenance Challenge Fund

DRAWING TITLE

A3022 - Kerswell Gardens to Hollicombe

drawing number */*/* ** | rev. -


Map View
A3022
21/1/15 11:30
Scale 1:12500
0
500m.
N



REVISIONS		
no.	date	details

NOTES	
no.	details
1.	Areas of Concrete

drawn: LS	scale(s): NTS
checked: TN	date: JANUARY 2014

TORBAY COUNCIL

SUE CHERITON
EXECUTIVE HEAD,
RESIDENTS & VISITOR SERVICES.
LOWER GROUND FLOOR.
TOWN HALL.
TORQUAY.
TQ1 3DR

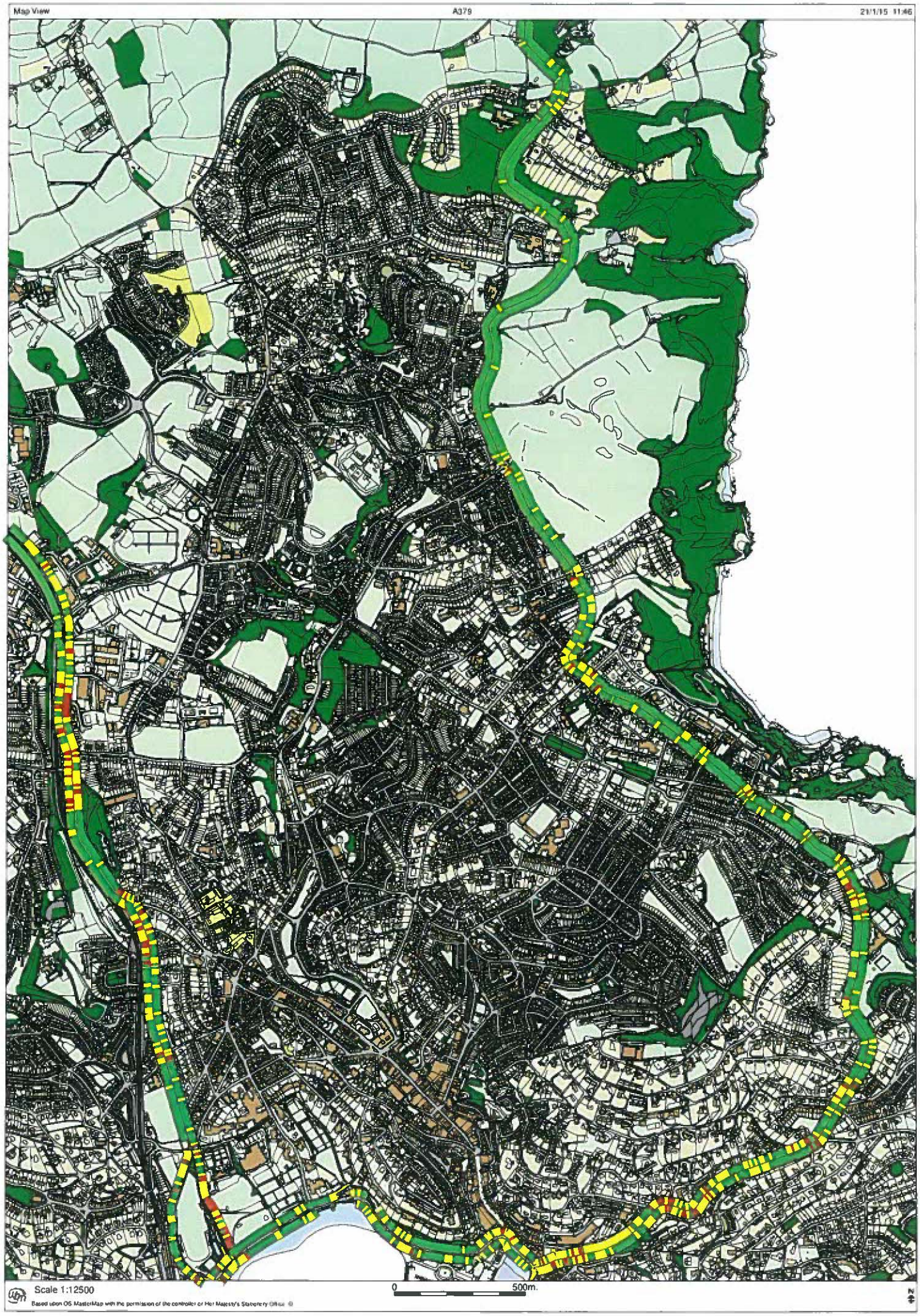
SCHEME TITLE

Dft Highways Maintenance Challenge Fund

DRAWING TITLE

A379 - Cary Parade to St Anne's Road, Babbacombe

drawing number */*/* ** | rev. -


Map View
A379
21/1/15 11:46
Scale 1:12500
0
500m.
N

Local Highways Maintenance Challenge Fund
Torbay Primary Access Renewal

Appendix B

Scheme Summary and Estimating Data

Scheme Name	Torbay Primary Access Renewal

Length (lin.m)	9,357
Area (sq.m)	95,714 Resurfacing
Area (sq.m)	49,941 Composite Base

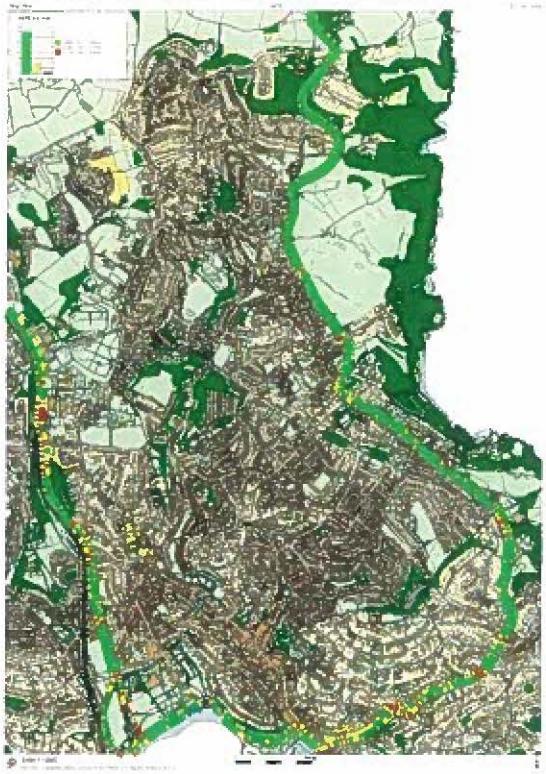
TOTAL SCHEME COST
£7,540,532

Carriageway		Rate	Unit	Total Cost
Surface 1 layer	Resurface SMA	£36	Sq.m	3,445,704
Surface 2 layers	Resurface SMA (2,016 sq.m additional)	£18	Sq.m	36,288
Surface composite	Flexible construction (additional)	£58	Sq.m	2,896,578
Gully renewal	200 (Avenue Rd, Kings Dr, Babbacombe Rd)	£140	No.	28,000
TOTAL				6,406,570

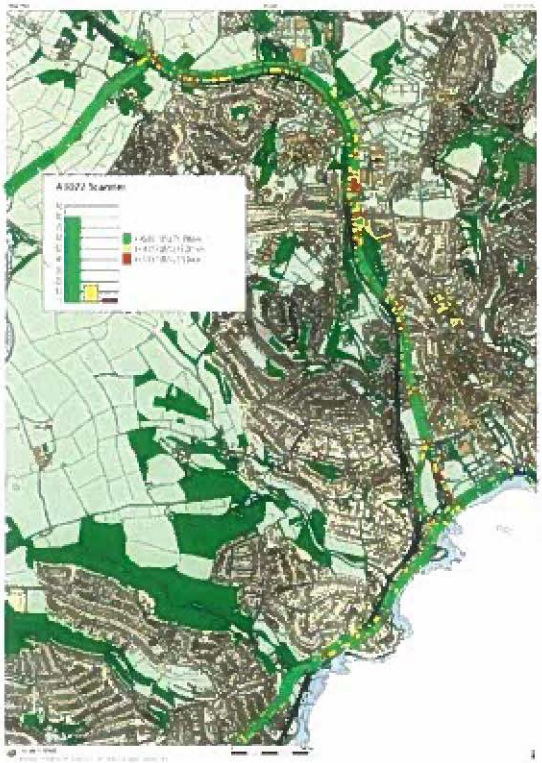
Contingency	10%	640,657

Design & Supervision	7%	493,305

A379 Scanner



A3022 Scanner



A3022 DfT Challenge Fund

Section	Length	Width	Area	Construction	Estimate Rate	Total
Riviera Way – Kerswell Gardens to Scotts Bridge	194	18	3,492	Flex	36	125,712
Riviera Way – Scotts Bridge to Browns Bridge Road	538	14	7,532	Flex	36	271,152
Riviera Way – Browns Bridge to Lowes Bridge	822	14	11,508	Flex	36	414,288
Riviera Way – Lowes Bridge to Woodland Road	213	14	2,982	Flex	36	107,352
Riviera Way – Woodland Road to Regent Close	105	11	1,155	Composite	94	108,570
Riviera Way – Regent Close to Old Woods Hill	198	13	2574	Flex	36	92,664
Riviera Way – Old Woods Hill to Shiphay Lane	62	14	868	Flex	36	31,248
Riviera Way – Shiphay Lane to Avenue Road	600	11	6,600	Flex	36	237,600
Avenue Road – Riviera Way to Cleveland Road	118	6.5	767	Flex	36	27,612
Avenue Road – Cleveland Road to Tor Park Road	132	8	1,056	Flex	36	38,016
Avenue Road – Tor Park Road to Crownhill Park	85	8	680	Flex	36	24,480
Avenue Road – Crownhill Park to Sanford Road	105	7	735	Flex	36	26,460
Avenue Road – Sanford Road to Mill Lane	164	9.8	1,607	Flex	36	57,852
Avenue Road – Mill Lane to Bampfylde Road	230	9	2,070	Flex	36	74,520
Avenue Road – Bampfylde Road to The Kings Drive	143	9	1,287	Flex	36	46,332
The Kings Drive – Avenue Road to Torbay Road	448	4.5	2,016	Flex	54	108,864
Torbay Road – The Kings Drive to Rathmore Road	125	16	2,000	Composite	94	188,000
Torbay Road – Rathmore Road to Seaway Lane	177	9	1,593	Composite	94	149,742
Torbay Road – Seaway Lane to Cockington Lane	364	9	3,276	Composite	94	307,944
Torbay Road – Cockington Lane to Cliff Road	213	9	1,917	Composite	94	180,198
Torbay Road – Cliff Road to Wheatridge Lane	313	9.3	2,911	Composite	94	273,634
Torbay Road – Wheatridge Lane to Tarraway Road	642	9	5,778	Composite	94	543,132
Torbay Road – Tarraway Road to Fortescue Road	216	11	2,376	Composite	94	223,344
			66,870			3,658,716

A379 DfT Challenge Fund

Section	Length	Width	Area	Construction	Estimate Rate	Total
Cary Parade – Torbay Road to Strand	130	14	1,820	Flex	94	171,080
Strand – Cary Parade to Torwood Street	168	15	2,520	Flex	94	236,880
Torwood Street – Strand to The Terrace	166	11	1,826	Composite	94	171,644
Torwood Street – The Terrace to Babbacombe Road	78	11	858	Composite	94	80,652
Babbacombe Road – Torwood Street to Braddons East	277	10	2,770	Composite	94	260,380
Babbacombe Road – Braddons East to Lisburne Sq	284	9	2,556	Composite	94	240,264
Babbacombe Road – Lisburne Sq to Lincoln Hill Rd	414	7	2,898	Composite	94	272,412
Babbacombe Road – Lincoln Hill Rd to Ilsham Road	163	8	1,304	Composite	94	122,576
Babbacombe Road – Ilsham Road to Hgr Warberry	113	7	791	Composite	94	74,354
Babbacombe Road – Hgr Warberry to Asheldon Rd	164	8	1,312	Composite	94	123,422
Babbacombe Road – Asheldon Rd to Ansteys Cove Rd	518	9	4,662	Composite	94	438,228
Babbacombe Road – Ansteys Cove Rd to Perinville Rd	172	9	1,548	Composite	94	145,512
Babbacombe Road – Perinville Rd to Perinville Road	458	8	3,664	Composite	94	344,416
Babbacombe Road – Perinville Rd to St Annes Rd	45	9	405	Composite	94	38,164
			29,102			2,719,984

Combined bid – carriageway only £5,648,453

Local Highways Maintenance Challenge Fund
Torbay Primary Access Renewal

Appendix C

Site Specific Risk Assessment

Risk Assessment – Torbay Primary Access Renewal

Risk No.	Risk Type:	Key Signs:	Probability Score (1-4)	Probability Description	Impact Score (1-4)	Impact Description:	Risk Score:	Risk Rating:	Controls Required:	Value £
1	Unkown services encountered	Initial excavations	2	Other, previous work in the area did not find any unexpected services	2	Project delayed increased cost	4	Low	Carry out initial exploration – liaison with utilities	30,000
2	Adverse weather	Forecast, Heavy rain, Snow, Frost, Wind Conditions	2	Medium risk of weather delay, works in winter more subject to adverse conditions	3	Project delayed increased cost	6	Medium	Allow contingency following analysis of similar projects	20,000
3	Loss of political support	Change in composition of Council	1	Probability is low given cross party support	2	Delay to allow mediation or cost to redesign	2	Low	Funding reconsidered	50,000
4	High level of traffic congestion	Tailbacks, customer complaints, local media	2	Some impact on traffic flow during construction to be managed	1	Short term delay	2	Low	Coordinate works to avoid peak seasonal traffic	Nil
5	Failure to achieve outcome	Congestion, Air Quality, Traffic data	1	Modelling shows improvement to network	3	Further works required to deliver improvements	3	Low	Working with partners to set realistic expectations	150,000
6	Ground conditions	Excavation difficult (or voids)	1	Other, previous work in the area did not find any unexpected services	3	Delay	3	Low	Carry out trial excavations at early stage	25,000
7	Unforeseen increase in project costs	Budget profile	1	Cost includes contingency	4	Delay resolving finances or awaiting other resources or awaiting other resources	4	Low	Maximise value engineering and review most beneficial elements	75,000
8	Loss of contractor due to unforeseen circumstances	Programmes not met evidence of financial difficulty	1	Council's Corporate Procurement Strategy will ensure sound contractor is appointed	3	Delay awaiting other resources	3	Low	Financial assessments carried out as part of tender stage	20,000
									Total Value	370,000
									P50 Value	200,000

Local Highways Maintenance Challenge Fund
Torbay Primary Access Renewal

Appendix D

Highway Maintenance Challenge Fund VFM Pro-Forma

Highways Maintenance Challenge Fund VfM Pro-Forma

The pro-forma should be filled in with as much of the 'specific data' as possible - with supporting data / information included where possible.
Not all elements will be relevant for every bid - however we would expect for most bids 'specific data' will be available for at least rows 1 and 2.
In the 'Specific Data' Column - please supply the information in the units/format requested.
The 'Other Supporting Data' column should be used to provide salient details not captured under 'Specific Data' and/or further supporting information.
Please add any further information on scheme benefits either at the end of this pro-forma or within the body of the main bid (or annexes)

Input data	Specific Data	Other Supporting Data / Information (either input directly or provide reference to supporting information reported elsewhere)	Information requested
Length of Scheme	9.4(Km)	Maps in appendix A showing general location, condition survey and skidding resistance information.	*Provide length of route covered by the scheme - if an area wide scheme then provide total route length covered by scheme.*
Number of vehicles (or users) on affected section (split by vehicle type if possible)	(Total Vehs - 33,722 AADT) (Cars - 28,368 AADT) (LGV - 4,163 AADT) (HGV - 711 AADT)	Riviera Way on the A3022 had 23,730 AADT Cars 20,207, LGV 2627, HGV 533. Babbacombe Road on the A379 recorded 10,002 AADT Cars 8161, LGV 1,536, HGV and buses 178. These figures being from the 2013 DfT data.	*Provide an estimate of the traffic flow on the section of route covered by the scheme - also provide details of the data used to support that estimate (e.g. age, type and duration of count, etc.).*
Details of required restrictions/closures if funding not provided (e.g. type of restrictions; timing/duration of restrictions; etc.)	Temporary road closures (start date of restriction - 09/16)	No planned closure of whole of route, but need to temporarilly restrict traffic on individual sections whilst resurfacing work occurs.	*Provide details of any future restrictions. E.g. If restrictions to particular vehicle types will be needed in the do minimum (i.e. without funding) provide details of why they are required, what vehicle types are covered and when such restrictions will come into place.*
Length of any diversion route, if closure is required (over and above existing route)	6.5(Km)	Worst case diversion routing is associated with A379 section requiring a 6.5 km diversion to Teignmouth and Newton Roads	*Provide estimate of the length of diversion route over and above existing route. It would be helpful to support this with some mapping to demonstrate this.*
Average extra time per vehicle on diversion route (over and above existing route)	7 (mins)	Approx 7 minutes	*Provide estimate of the average extra time vehicles would spend on the diversion route over and above existing route. It would be helpful to support this with details of any data used/assumptions made (e.g. source of speed data used in any calculations).*
Regularity/duration of closures due to flooding: (e.g. number of closures per year; average duration of closure (hrs); etc.)	(number of closures/year) 1 (duration of closure - hrs) 3hrs (length of diversion - Km) 2 (extra time in using diversion - mins) 3	Avenue Road closures on average once per annum. Typically involving 2 to 3 hours to clear drainage. Localised diversion leading to some delays at junctions.	*Provide estimates of closures / durations /delay and provide details of the data used to support those estimates (e.g. number of years of data etc.).*
Number and severity of accidents: both for the do minimum and the forecast impact of the scheme (e.g. existing number of accidents and/or accident rate; forecast number of accidents and or accident rate with the scheme)	(33.33 Total accidents/yr) (26.66 Slight Accidents/yr) (6.66 Serious Accidents/yr) (0.33 Fatal Accidents/yr) 0.297 (DM Accident Rate - PIA/MVKm) 30(DS Total Accidents/yr) 28(DS Slight Accidents/yr) 2(DS Serious Accidents/yr) 0(DS Fatal Accidents/yr) 0.27(DS Accident Rate - PIA/MVKm)	Whilst surfacing scheme will not be expected to have major impact on accidents, the recorded collisions involving injuries for the last 36 months of records are as follows:- A3022 1 fatal, 15 serious, 55 slight (of these 3 slight categories included reference to road environment factors) the A379 for the same period recorded 5 serious and 25 slight injury incidents (1 of these included reference to road environment factors)	*Provide estimates of accidents (split by severity if possible) or accident rates for the without scheme (DM) case and the with scheme case (DS). Provide details of the data and assumptions/analysis used to support these estimates (e.g. number of years of data, etc.).*
Number of existing cyclists; forecasts of cycling usage with and without the scheme (and if available length of journey)	(240 cyclists/day) (DM av trip length - Km) (240 cyclists/day) (DS av trip length - Km)	240 pedal cyclists split 227 on A3022 and 13 on A379	*Provide estimates of the number of cyclists (and if possible trip length) for the without scheme (DM) case and the with scheme case (DS). Provide details of the data and assumptions/analysis used to support these estimates.*
Other salient information for the VfM Case	Provide a textual description or reference to salient part of main bid		*A description of the do-minimum situation (i.e. what would happen without Challenge Fund investment). Details of significant monetised and non-monetised costs and benefits of the scheme.*

Appendix E

Photographs of the Carriageways

The first page following shows sections of the A379 which is almost all composite construction. The photographs clearly show the reflective cracking from the concrete base layers and problems at an old utility reinstatement.
These are present along much of the length of the carriageway and show how close these defects are to residential properties (5th photograph)

The second page shows similar age and condition defects along sections of the A3022.