







Fiscal Year 2018 Capital Budget Requests February 27, 2017

Table of Contents

Section I. Transmittal Letter	1
Section II. Summary of Capital Requests	1
Section III. Detail of Capital Requests	
Department of Public Works	
Snowfighter Conversion	3
Sidewalk Maintenance	5
2005 Chevy Silverado Pick-up Truck Replacement	7
Water Main Replacement	16
Water Main Bond Repayment	19
Emergency Service Van	21
Water Smart Meter Replacement Program Phase II	23
2008 Dump Truck #9 Replacement	25
2003 Dump Truck #18 Replacement	27
Sewer Smart Meter Replacement Program Phase II	29
Police	
Replacement of Network Switches	35
Replacement of Netclock System	37
Town Clerk	
Election Systems Upgrade	40
Information Technology	
Fiber Network Assessment	41
Upgrade Main Town Network Hubs	43

Lib	rary	•••••
	Quiet Study Rooms	48
	Phase I of Lighting Retrofits	50
	Fill, Seal, Stripe Parking Lot	52
	Gutters	54
Fir	e	
	Fire Staff Vehicle I	56
	Fire Staff Vehicle II	59
	Squad I Replacement	62
Fac	cilities	•••••
	Town/School Security Upgrades	77
	System Wide Building Envelope	80
	Purchase HVAC Technician Van	83
	Chenery Middle School Univent Repairs	85
	Chenery Refinish Gymnasium Floor	88
	Butler Cafeteria Floor Replacement	90
Scł	nools	•••••
	Chromebook Devices	95
	Upgrade of Chenery Middle School Network Wiring	97
Co	mmunity Development	
	Burbank School Pedestrian/Traffic	100
	Pavement Management	102
	Sewer and Drain Repair	105
	Five Vear Capital Request	100



TOWN OF BELMONT

OFFICE OF THE BOARD OF SELECTMEN 455 CONCORD AVENUE BELMONT, MASSACHUSETTS 02478

Selectmen@belmont-ma.gov

455 CONCORD AVENUE BELMONT, MA 02478-2573 PHONE (617) 993-2610 FAX (617) 993-2611 BOARD OF SELECTMEN SAMI S. BAGHDADY, Chair MARK A. PAOLILLO, Vice-Chair JAMES R. WILLIAMS, Selectman

TOWN ADMINISTRATOR
DAVID J. KALE

ASSISTANT TOWN ADMINISTRATOR
PHYLLIS L. MARSHALL

February 27, 2017

To the Honorable, the Board of Selectmen and Capital Budget Committee,

Attached please find the FY18-FY23 Capital Budget requests for your review, as developed by School and Town Department Heads.

Capital Requests have been broken out by the categories and are summarized on the spreadsheets contained in the beginning of the packet:

The funding contained in the FY18 Submitted Capital Budget allocation totals \$3,170,000 not including funding for enterprise fund capital requests. This amount includes \$1,642,000 to support the Pavement Management Program, \$210,000 for Sidewalk Repairs and \$1,318,000 for pay-as-you-go capital budget items. Overall, the FY18 Capital submission totals \$3,218,600.

As always, please contact us if you need additional information. Thank you for your consideration.

Very truly yours,

David J. Kale
Town Administrator

	F'	Y18		FY19		FY20		FY21		FY22		FY23		TOTAL
DEPARTMENT OF PUBLIC WORKS														
Sidewalk Maintenance	\$	210,000		215,250		220,631		226,147		231,801	,	237,596		1,341,425
Sidewalk Maintenance Sub Total	\$	210,000	\$	215,250	\$	220,631	\$	226,147	\$	231,801	\$	237,596	\$	1,341,425
													\$	1,341,425
Major Capital Equipment Replacement Costs												*****		
Highway														
Snow fighter Conversion (#34) (#32) (#36)	\$	44,940	\$	44,940	\$	44,940	\$	-	\$		\$	-	\$	134,820
9' Material Spreader (#74) (#73)		-	<u> </u>			-		15,000		-		15,000		30,000
1.5 Ton Sidewalk Roller (#62)		-		15,750		-		-				-		15,750
Central Fleet Utility Truck (#6)						66,300		-				-		66,300
			L											
Parks														
1 Ton 4WD Pickup Truck (#103) (#104)		45,300		-		-		-		45,300		-		90,600
Small Front End Loader (#108)		-		86,800	I	-		-		-		-		86,800
19000 GVW Dump Truck (#106)		-		-		79,900		-		_		-		79,900
Toro 16 Foot Cut Riding Mower		-		_		-		73,500		-		-		73,500
Cemetery														
Loader Backhoe (#120)		-		121,000		-		_		_		_		121,000
1 Ton 4WD Pickup Truck (#117)		-		-		45,300		-		_		-		45,300
19000 GVW Dump Truck (#119)		-		-		-		79,900		-		-		79,900
Sub Total	\$	90,240	\$	268,490	\$	236,440	\$	168,400	\$	45,300	\$	15,000	\$	823,870
													\$	823,870
POLICE DEPARTMENT	F'	Y18		FY19		FY20		FY21		FY22		FY23		TOTAL
Replace Network Switches	\$	35,000	\$	-	\$	-	\$	-	\$	-	\$	-	\$	35,000
Net Clock System		12,500		-		-		-		-		-		12,500
Replacement of 2 Domain Controller Servers		-		20,000		-		-		-		-		20,000
Replacement of CAD/RMS Server		-		-		30,000		-		-		_		30,000
Replace Telephone and Radio Logging Recorder		_		-		-		16,500		-		-		16,500
Replace LiveScan Fingerprint System		-		_		-		-		20,000		-	-	20,000
Replace Police Radio Repeaters		_		-		-		-		-		45,000		45,000
Sub Total	\$	47,500	\$	20,000	\$	30,000	\$	16,500	\$	20,000	\$	45,000	\$	179,000
The state of the s	a. Everyon production	- A - BUTS I PUT ST		Lab Le Danna Erc* tra Comit	1.7.7.7.2.2	AND THE PROPERTY OF THE PROPER	1.7. G	gung anar graffar erg. Riff dri.	Lu-Jresdil	reason of the art please from the	TELFET TO	enum ne de Ma gregorio	\$	179,000
TOWN CLERK	F	Y18		FY19		FY20		FY21		FY22		FY23		TOTAL
Election Systems Upgrade	\ <u> </u>		\$	75,000	\$	-	\$		\$		\$	-	\$	75,000
Sub Total	<u> </u>		\$	75,000			\$		\$	metrice e invite	\$		\$	75,000
	- A MET EAGLED	nead both bill	or y ddig	, ,,,,,,,,,	95 7 254	mentolidiffial	ELYS. S.	austre finisi (als Pillis)	er Carriello I	one (State)	arrivit.		\$	75,000 75,000
			L		Ь						L		Ψ	73,000

INFORMATION TECHNOLOGY	FY18	FY19	FY20	FY21	FY22	FY23	TOTAL
Fiber Network Assessment, Mapping and Testing	\$ 60,000	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 60,000
Upgrade Main Town Network Hubs to 10GB Speed	30,000	-	-	-	-	-	30,000
Fiber Network Engineering & Design Services	-	50,000	-	-	-	-	50,000
Additional Data Storage Network	-	90,000	-	-	-	90,000	180,000
Network Construction Services	-	_	200,000	-	-	-	200,000
Sub Total	\$ 90,000	\$ 140,000	\$ 200,000	\$	\$ 100 100 100 100 100 100 100 100 100 10	\$ 90,000	\$ 520,000
							\$ 520,000
LIBRARY	FY18	FY19	FY20	FY21	FY22	FY23	TOTAL
Quiet Study Rooms Build-out	50,000	-	-	-	-	-	50,000
Upgrade Light Fixtures Throughout (Lighting Retrofit)	50,000	50,000	-	-	-	-	100,000
Crack, Fill Seal Stripe Parking Lot	20,000	-	-	-	-	-	20,000
Replace Gutters (Including Design)	\$ 35,000	\$ -	\$ -	\$ -	\$ -	\$ -	35,000
Chiller Rooftop Replacement	-	200,000	-	-	-	-	200,000
Replace Windows And Exterior Doors	-	250,000	-	-	-	-	250,000
Replace/Rebuild Front Entrance Stairs & Railings (Upper)	-	32,000	-	-	-	-	32,000
Automatic Sprinkler System (wet)	-	-	400,000	-	-	-	400,000
Upgrade/Replace Unit Ventilators	-	-	40,000	-	-	-	40,000
Landscaping Redesign	-	-	38,000	-	-	-	38,000
Building Control System	-	-	60,000	-	-	-	60,000
Replace/Rebuilt Front Entrance Stairs & Railings (Lower)	-	-	-	130,000	-	-	130,000
Repave Parking Lot (storm water, regrading, etc.)	-	-	-	200,000	-	-	200,000
Replace Interior Doors & Hardware	-	-	-	62,500	-	-	62,500
Exterior Masonry & Railing Repairs General	-	-	-	12,500	-	-	12,500
Abatement of Stairwell Tiling & replace with new	-	-	-	18,000	-	-	18,000
15% Contractor's Overhead	_	79,800	80,700	63,450	_	_	223,950
10% Contingency	-	61,180	61,870	48,645	-	-	171,695
Sub Total	\$ 155,000	\$ 672,980	\$ 680,570	\$ 535,095	\$ -	\$ -	\$ 2,043,645
			:				\$ 2,043,645

FIRE DEPARTMENT	FY18	FY19	FY20	FY21	FY22	FY23	TOTAL
Replace Staff Vehicle 1 (Deffered from FY17)	\$ 57,200	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 57,200
Replace Staff Vehicle 2	57,200	-	-	-	-	_	57,200
Replace Squad 1 (1999 Ford)	12,000	-	-	-	-	-	12,000
Cardiac Monitor Replacement \$7,000 for 5 years *Equaling the							
\$35,000 Cardiac Monitor Cost *Will be Replaced in FY18	7,000	7,000	7,000	7,000	7,000	7,000	42,000
Ambulance Replacement \$65,000 for 5 years *Equaling the						, in the second	
\$325,000 Ambulance Cost *Will be Replaced in FY22	65,000	65,000	65,000	65,000	65,000	65,000	390,000
Public Safety Hardware, Software License, and Equipment	-	-	-	-	-	-	
Thermal Imaging Cameras Replacement	-	-	-	-	-	-	-
Shift Com Response Vehicle	-	-	-	-	-	-	-
Ladder Truck Replacement	-	-	-	-	-	-	_
Replace 1988 Engine	-	-	-	-	-	_	-
Fiber Optic Cable Network Expansion	-	_	_	_	_	_	_
Fire Ambulance / Monitor replacement program				-	_	_	_
Spill Response Trailer	25,000	-	_	-	-	_	25,000
Replace 2003 Pumper	-	625,000	_	_	-	_	625,000
Replace Shift Commander's Response Vehicle	_	-	60,000		_		60,000
Portable Radio Replacement	-	_	-	120,000	-	-	120,000
Replace Staff Car	_	_		- 120,000	-	57,200	57,200
Replace 2005/2014 Engine	_	_	_	_	_	625,000	625,000
Replace 2007 Engine (In 2027) - 625,000	_	-	_	_		-	
Replace 2014 Ladder Truck (In 2029) - \$1,040,000	_	-		_		_	_
Sub Total	\$ 223,400	\$ 697,000	\$ 132,000	\$ 192,000	\$ 72,000	\$ 754,200	\$ 2,070,600
Population of the Company of the Co	In Contract to Market Transport Contract to	the facility of the state of th				I VIII VIII VIII VIII VIII VIII VIII V	\$ 2.070,600
FACILITIES DEPARTMENT	FY18	FY19	FY20	FY21	FY22	FY23	TOTAL
Town/School Security Upgrades Design (Year 4 of 6)	\$ 200,000	\$ 200,000		The state of the s	\$ -	\$ -	\$ 600,000
System Wide Building Envelope	200,000	200,000	200,000	200,000	200,000	<u> </u>	1,000,000
Purchase Facilities HVAC Tech Van	30,000	-	-	-	-	-	30,000
Systemwide univent rebuild/replacement (multiple years)	,						
CheneryMiddle School FY18	50,000	50,000	50,000	50,000	_	_	200,000
Chenery - Refinish Gym Floor	67,000	-	-	-	-	-	67,000
Butler Cafeteria Flooring - Asbestos & moisture mitigation	70,000						
	70,000	-	_	_	-	-	70,000
Butler Replace boilers (Year 2 of 2)	70,000	-	50,000		-		70,000 50.000
Butler Replace boilers (Year 2 of 2) Butler Replace emergency generator		-					50,000
Butler Replace emergency generator	-		50,000		_	-	
Butler Replace emergency generator Burbank Replace boilers (Year 2 of 2)	- -	37,500 -	50,000	-	-	-	50,000 37,500 60,000
Butler Replace emergency generator Burbank Replace boilers (Year 2 of 2) Winn Brook - Replace Master Clock System	-	37,500 - 47,598	50,000 - 60,000	-			50,000 37,500 60,000 47,598
Butler Replace emergency generator Burbank Replace boilers (Year 2 of 2) Winn Brook - Replace Master Clock System Higginbottom Pool Resurfacing	- - -	37,500 - 47,598 50,000	50,000 - 60,000 -	- - -	- - - -		50,000 37,500 60,000 47,598 50,000
Butler Replace emergency generator Burbank Replace boilers (Year 2 of 2) Winn Brook - Replace Master Clock System Higginbottom Pool Resurfacing Chenery Middle School Resurface Auditorium Stage	- - - -	- 37,500 - 47,598 50,000 30,000	50,000 - 60,000 - -	- - - -	- - - -	- - - -	50,000 37,500 60,000 47,598 50,000 30,000
Butler Replace emergency generator Burbank Replace boilers (Year 2 of 2) Winn Brook - Replace Master Clock System Higginbottom Pool Resurfacing Chenery Middle School Resurface Auditorium Stage Chenery Middle School Stage Equipment Risk Assessment	- - - - -	- 37,500 - 47,598 50,000 30,000 15,000	50,000 - 60,000 - - -	- - - - -	- - - - -	- - - -	50,000 37,500 60,000 47,598 50,000 30,000 15,000
Butler Replace emergency generator Burbank Replace boilers (Year 2 of 2) Winn Brook - Replace Master Clock System Higginbottom Pool Resurfacing Chenery Middle School Resurface Auditorium Stage Chenery Middle School Stage Equipment Risk Assessment Burbank - Site redevelopment study	- - - - -	- 37,500 - 47,598 50,000 30,000 15,000 50,000	50,000 - 60,000 - - - -	- - - - -	- - - - - -	- - - - -	50,000 37,500 60,000 47,598 50,000 30,000 15,000 50,000
Butler Replace emergency generator Burbank Replace boilers (Year 2 of 2) Winn Brook - Replace Master Clock System Higginbottom Pool Resurfacing Chenery Middle School Resurface Auditorium Stage Chenery Middle School Stage Equipment Risk Assessment Burbank - Site redevelopment study Chenery - Upgrade Auditorium Lighting Control System	- - - - - -	- 37,500 - 47,598 50,000 30,000 15,000 50,000 25,000	50,000 - 60,000 - - - - - -	- - - - - - -	- - - - - - - - -	- - - - - - -	50,000 37,500 60,000 47,598 50,000 30,000 15,000 50,000 25,000
Butler Replace emergency generator Burbank Replace boilers (Year 2 of 2) Winn Brook - Replace Master Clock System Higginbottom Pool Resurfacing Chenery Middle School Resurface Auditorium Stage Chenery Middle School Stage Equipment Risk Assessment Burbank - Site redevelopment study Chenery - Upgrade Auditorium Lighting Control System School Parking Lot and Sidewalk Paving Management (Yr. 1 of 5)	- - - - - - -	- 37,500 - 47,598 50,000 30,000 15,000 50,000 25,000 100,000	50,000 - 60,000 - - - - -	- - - - -	- - - - - -	- - - - - -	50,000 37,500 60,000 47,598 50,000 30,000 15,000 50,000 25,000 500,000
Butler Replace emergency generator Burbank Replace boilers (Year 2 of 2) Winn Brook - Replace Master Clock System Higginbottom Pool Resurfacing Chenery Middle School Resurface Auditorium Stage Chenery Middle School Stage Equipment Risk Assessment Burbank - Site redevelopment study Chenery - Upgrade Auditorium Lighting Control System School Parking Lot and Sidewalk Paving Management (Yr. 1 of 5) Lawn Mower for Maintenance Department	- - - - - - - - -	- 37,500 - 47,598 50,000 30,000 15,000 50,000 25,000 100,000 15,000	50,000 - 60,000 - - - - - - 100,000	- - - - - - - - 100,000	- - - - - - - - 100,000	- - - - - - - 100,000	50,000 37,500 60,000 47,598 50,000 30,000 15,000 50,000 25,000 500,000
Butler Replace emergency generator Burbank Replace boilers (Year 2 of 2) Winn Brook - Replace Master Clock System Higginbottom Pool Resurfacing Chenery Middle School Resurface Auditorium Stage Chenery Middle School Stage Equipment Risk Assessment Burbank - Site redevelopment study Chenery - Upgrade Auditorium Lighting Control System School Parking Lot and Sidewalk Paving Management (Yr. 1 of 5) Lawn Mower for Maintenance Department One 6-Wheel (1 ton) Dump Truck to Replace Current Silverado	- - - - - - - - -	- 37,500 - 47,598 50,000 30,000 15,000 25,000 100,000 15,000 48,709	50,000 - 60,000 - - - - - - 100,000	- - - - - - - - 100,000	- - - - - - - - 100,000	- - - - - - - 100,000	50,000 37,500 60,000 47,598 50,000 30,000 15,000 50,000 25,000 500,000 15,000 48,709
Butler Replace emergency generator Burbank Replace boilers (Year 2 of 2) Winn Brook - Replace Master Clock System Higginbottom Pool Resurfacing Chenery Middle School Resurface Auditorium Stage Chenery Middle School Stage Equipment Risk Assessment Burbank - Site redevelopment study Chenery - Upgrade Auditorium Lighting Control System School Parking Lot and Sidewalk Paving Management (Yr. 1 of 5) Lawn Mower for Maintenance Department	- - - - - - - - - -	- 37,500 - 47,598 50,000 30,000 15,000 50,000 25,000 100,000 15,000	50,000 - 60,000 - - - - - - 100,000	- - - - - - - - 100,000	- - - - - - - 100,000	- - - - - - - 100,000	50,000 37,500 60,000 47,598 50,000 30,000 15,000 50,000 25,000 500,000
Butler Replace emergency generator Burbank Replace boilers (Year 2 of 2) Winn Brook - Replace Master Clock System Higginbottom Pool Resurfacing Chenery Middle School Resurface Auditorium Stage Chenery Middle School Stage Equipment Risk Assessment Burbank - Site redevelopment study Chenery - Upgrade Auditorium Lighting Control System School Parking Lot and Sidewalk Paving Management (Yr. 1 of 5) Lawn Mower for Maintenance Department One 6-Wheel (1 ton) Dump Truck to Replace Current Silverado Winn Brook - Replace fire alarm system	- - - - - - - - - - - - - - - - - - -	- 37,500 - 47,598 50,000 30,000 15,000 25,000 100,000 15,000 48,709	50,000 - 60,000 - - - - - 100,000 - - - -	- - - - - - - 100,000	- - - - - - - - 100,000	- - - - - - - 100,000	50,000 37,500 60,000 47,598 50,000 30,000 15,000 50,000 500,000 15,000 48,709 158,658 50,000

SCHOOL DEPARTMENT		FY18	FY19	Π	FY20	FY21	FY22		FY23		TOTAL
150 Chromebooks and 5 Carts for Chenery	\$	39,960	\$ -	\$	-	\$ -	\$ -	\$	-	\$	39,960
Wiring Upgrade for Chenery - (Price Available After 03/15)		65,500	\$ -	\$	-	\$ -	\$ -	\$	-	\$	65,500
Sub Total	\$	105,460	\$	\$		\$	\$	\$		# \$ #	105,460
										\$	105,460
COMMUNITY DEVELOPMENT - PAVEMENT MANAGEMENT		<u>FY18</u>	FY19	1	<u>FY20</u>	<u>FY21</u>	<u>FY22</u>	L	<u>FY23</u>		<u>TOTAL</u>
Road Program (all elements) Excluding CH90	\$	1,642,000	\$ 1,683,050	\$	1,725,126	\$ 1,768,254	\$ 1,812,461	\$	1,857,772	\$	10,488,663
Chapter 90		535,089	535,089		535,089	535,089	535,089		535,089		3,210,534
Pavement Management Sub Total	\$	2,177,089	\$ 2,218,139	\$	2,260,215	\$ 2,303,343	\$ 2,347,550	\$	2,392,861	\$	13,699,197
Pedestrian Safety Upgrades - Burbank School	\$	38,000	-		-	-	-		-	\$	38,000
Sub Total	\$	38,000	\$	\$		\$	\$	\$		\$_	38,000
										\$	38,000
GRAND TOTAL	\$	3,753,689	\$ 5,384,324	\$	4,419,856	\$ 3,791,485	\$ 3,016,650	\$	3,634,657	\$	24,000,661
										\$	24,000,661
	<u> </u>			<u> </u>		 	 				
Net Discretionary: Excludes Pavement Management and Sidewalk Repair Requests	\$	1,366,600	\$ 2,950,935	\$	1,939,010	\$ 1,261,995	\$ 437,300	\$	1,004,200	\$	8,960,040
•										\$	8,960,040

FY18-FY23 Capital Budget Request-Water and Sewer

DEPARTMENT OF PUBLIC WORKS	<u>FY18</u>		<u>FY19</u>		FY20	FY21		<u>FY22</u>		FY23		TOTAL
Water Enterprise												
Water Main Replacement	\$	250,000	\$	250,000	\$ 250,000	\$	250,000	\$	250,000	\$	250,000	\$ 1,500,000
Water Main Bond Repayment		718,621		754,552	792,280		831,894		873,488		917,163	4,887,998
Smart Meter Program Phase II		1,100,000		-	-		-		-		_	1,100,000
Major Capital Equipment Replacement Costs												
#80 - Emergency Service Van		35,200		-	-		-		-		-	35,200
1 - Ton Pickup Truck Replacement		-		45,300	-		-		-		-	45,300
37,000 GVW Dump Truck		-		-	130,305		-		-		-	130,305
Administrative Vehicle		-		-	-		-		40,850		-	40,850
TOTAL	\$	2,103,821	\$	1,049,852	\$ 1,172,585	\$	1,081,894	\$ '	1,164,338	\$ 1	1,167,163	\$ 7,739,653
												\$ 7,739,653

FY18-FY23 Capital Budget Request - Water and Sewer

DEPARTMENT OF PUBLIC WORKS - Sewer Enterprise	Г	FY18	 FY19	FY20		FY21		FY22	FY23	TOTAL
	1	为是14 5时			CHARLES .					
Major Capital Equipment Replacement Costs										
Highway										
Replace 2008 - 19,000 GVW Dump Truck #9	\$	79,900	\$ -	\$ -	\$	-	\$	-	\$ -	\$ 79,900
Replace 2003 - 37,000 GVW Dump Truck #18	\$	130,305	\$ -	\$ -	\$	-	\$	-	\$ 	\$ 130,305
Smart Meter Program Phase II	\$	500,000	\$ _	\$ -	\$	-	\$	-	\$ -	\$ 500,000
Pickup Truck #3	\$	-	\$ 34,970	\$ -	\$	-			\$ _	\$ 34,970
Sewer Rodder	\$	-	\$ 33,700	\$ -	\$	-			\$ 	\$ 33,700
Air Compressor	\$	-	\$ 26,250	\$ -	\$	-	\$	-	\$ -	\$ 26,250
Street Sweeper	\$	-	\$ -	\$ 196,800	\$	-	\$	-	\$ -	\$ 196,800
Administrative Vehicle	\$	-	\$ -							\$ -
Trapelo Road Culvert Replacement (Stormwater Porject)	\$	-	\$ 500,000	\$ -	\$	-	\$	-	\$ -	\$ 500,000
Front End Loader	\$	-	\$ -	\$ -	\$	204,000	\$\$	-	\$ 204,000	\$ 408,000
Pickup Truck #4	\$	-					\$\$	45,300		\$ 45,300
Pickup Truck #7	\$	-					\$	45,300		\$ 45,300
DEPARTMENT OF PUBLIC WORKS TOTAL	\$	710,205	\$ 594,920	\$ 196,800	\$	204,000	\$	90,600	\$ 204,000	\$ 2,000,525
										\$ 2,000,525
	は記録	阿拉拉斯 建设置								1000 地名

FY18-FY23 Capital Budget Request - Water and Sewer

COMMUNITY DEVELOPMENT - Sewer Enterprise		FY18		FY19		FY20		FY21		FY22		FY23		TOTAL
Outfalls Investigation (EPA) -														
Sampling and Analysis	\$	40,000	\$	70,000	\$	70,000	\$	50,000	\$	50,000	\$	50,000	\$	330,000
Design/ Engineering	\$	50,000	\$	50,000	\$	50,000	\$	-	\$	-	\$	-	\$	150,000
Construction	\$	-	\$	-	\$	_	\$	_	\$	-	\$	-	\$	-
Sub Total	\$	90,000	\$	120,000	\$	120,000	\$	50,000	\$	50,000	\$	50,000	\$	480,000
	T												\$	480,000
							200	an tariferen w						
I/I Mitigation (MWRA) -			107/01/01/01											
Design/ Engineering	\$	100,000	\$	25,000	\$	_	\$	70,000	\$	25,000	\$	-	\$	220,000
Construction	_	_	\$	_	\$	_	\$	_	\$	_	\$		\$	-
Sub Total		100,000	\$	25.000	S		\$	70,000	\$	25.000	\$	rate de la companya d	\$	220,000
The state of the first first from the state of the state	1 n	lanadoretris (16.6) C.S.O.V.	200		11000 - CLE	AND REAL PROPERTY OF THE PERSON	10.4.9	option administration (Co. Co.)	100		HH-T-M-H	ARTHUR POLICE OF THE PROPERTY	\$	220,000
											非智			
MS4 Permit (NPDES) -			oter term				THE STATE OF	eroscomolistes (viene bet no filia Edilla	THE SOURCE SERVICE		CATHERINA C			
Permit Compliance	\$	30,000	\$	75,000	\$	100,000	\$	100,000	\$	100,000	\$	100,000	\$	505,000
Sub Total	_	30,000	\$	75,000	\$	100,000	\$	100,000	\$	100,000	\$	100,000	\$	505,000
	1 (a. V . 5)		Ψ	,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	30 Y.45		PTLYSTIC		LEMER		DELYES:		\$	505,000
	1343				的觀						60	de la companya de la	A CONTRACT	505,000
Sewer and Drain Repairs -	Sales of the last		Service S		1000 Bug						25520	de la Platación	TO SHARE	
Sewer and Drain CCTV and Design Report	\$	80,000	\$	80.000	\$	80,000	\$	80.000	\$	80,000	\$	80,000	\$	480,000
Sewer and Drain Relining and Point Repairs		200,000	\$	200,000	\$	200,000		200,000	\$	200,000	\$	200,000		1,200,000
Sub Total	_	280,000	\$	280,000	\$	280,000	\$	280,000	\$	280,000	\$	280,000		1,680,000
Expension that are all the provided and the control of the provided and the control of the contr	E E . 7.79				hit vice		P415 7 22/0	MAINTENNA DE SERVADO	unita sargi		tata Tatan		\$	1.680.000
Total Sewer Enterprise	\$	500,000	\$	500,000	\$	500,000	\$	500,000	\$	455,000	\$	430,000	\$	2,885,000
													\$	2,885,000
COMMUNITY DEVELOPMENT		FY18		FY19		FY20		FY21		FY22		FY23		TOTAL
Loan Repayments (Debt Service)														
Sewer Bond - FY06	\$	170,427	\$	161,377	\$	157,477	\$	153,577	\$	149,677	\$	140,777	\$	933,312
DEP CWSRF pt1	\$	446,172	\$	445,665	\$	445,148	\$	444,620	\$	444,081	\$	443,532	\$	2,669,218
DEP CWSRF pt2		97,171	\$	97,171	\$	97,171	\$	97,171	\$	97,171	\$	97,171	\$	583,026
CWSRF (2012)	\$	142,531	\$	142,554	\$	142,577	\$	142,601	\$	142,625	\$	142,650		855,538
Future Borrowing (DEP)	\$	-	\$	175,000	\$	175,000	\$	175,000	\$	175,000	\$	175,000	\$	875,000
Sub Total	\$	856,301	\$	1,021,766	\$	1,017,373	\$	1,012,970	\$	1,008,554	\$	999,130	\$	5,916,094
													\$	5,916,094
COMMUNITY DEVELOPMENT TOTAL	\$	1,356,301	\$	1,521,766	\$	1,517,373	\$	1,512,970	\$	1,463,554	\$	1,429,130	\$	8,801,094
													\$	8,801,094
TOTAL SEWER ENTERPRISE	\$	2,066,506	\$	2,116,686	\$	1,714,173	\$	1,716,970	\$	1,554,154	\$	1,633,130	\$	10,801,619
	12.		1				240		330		(A) AND		\$	10,801,619



Town of Belmont Department of Public Works

Memo

To: Capital Budget Committee

From: Jay Marcotte MPA, Director

Date: February 24, 2017

Re: Supplemental Information for the FY18 DPW Highway, Recreation, Parks and

Cemetery Capital Requests

In an effort to clearly separate Capital requests from the Capital Budget and Enterprise Fund accounts I have prepared two separate memos; this supplemental memo addresses the Capital needs for the tax supported portion of the Public Works budget.

It is important to note that all Public Works vehicles are shared within Public Works as well as with any other Town department that needs a vehicle (i.e. – Light, School, Health, Fire, and Building Services). In addition, it is Town policy to "procure the most fuel efficient and economical vehicles necessary for the purpose for which they are intended". The DPW follows this policy for every vehicle and considers hybrid and alternative fuel vehicles when possible.

The following items are requested in order of priority from the Capital Budget for FY2018:

1. Highway Division - Snowfighter Conversion - \$44,940

Replace #34 Snowfighter with the conversion of an existing 2010 Dump Truck. This continues the process of converting (the fifth of six) used dump trucks to the snowfighters in place of purchasing new snowfighters saving almost \$1M dollars in new truck costs over 20 years.

- Life Expectancy when refurbished Approximate 16 year life expectancy
- 3 year maintenance cost n/a

- Mileage/hours on #34 34,233 4092 hours
- Use (daily or weekly) Snow and Ice operations

2. Highway Division Maintenance - \$210,000- Sidewalk

Sidewalk repair is one of the most common requests from residents and businesses. DPW has over 1,000 requests for repair and we have estimated that a minimum of \$150,000 annually is needed for at least ten years to significantly reduce the backlog.

- Life expectancy 25 to 75 years
- 3-year maintenance cost n/a
- Mileage n/a
- Use (daily or weekly) daily

3. Parks Department – Chevy Silverado Pick-up Truck - \$45,300

Routine replacement of a 2005 Chevy Silverado Pick-up Truck #103

- Life expectancy of replacement approximately 8 years
- Miles/hours on #103 –
 80,702 (inoperable)
- 3-year maintenance cost for #103 --\$6,263.89
- Use (daily or weekly) daily



Town of Belmont

Department of Public Works

Memo

To: Capital Budget Committee

From: Jay Marcotte MPA, Director

Date: January 9, 2017

Re: FY18 DPW Highway and Recreation, Parks & Cemetery Capital Requests

DPW CBC REQUEST FOR FY 2018 FROM GENERAL FUND

1. WHAT IS THE PROJECT/ITEM -

Highway Division – Snowfighter Conversion (#34)

a. New proposal No

b. Replacement for something already existing Yes

i. If a replacement, year existing item was purchased. 1998

- ii. If a replacement, plan for existing item (auction, discard, reuse by other person in department, reuse by other department) Trade-in
- c. Additional enhancement for something existing No

2. REASON FOR THE REQUEST -

Replace #34 Snowfighter with the conversion of an existing 2010 Dump Truck. This continues the process of converting (the fifth of six) used dump trucks to snowfighters in place of purchasing new snowfighters saving almost \$1,000,000 dollars in new truck costs over 20 years.

3. COST - \$44,940

a. How was cost arrived at? (State Bid list, actual bid, professional cost estimate, based on past experience, wild guess) **State bid**

b. How recent is the estimate? (if older than a couple of years, you will be asked to refine or confirm it as current and that process could jeopardize the potential for getting on the list) **Current**

c. What effect will this have on future operating budgets? None

i. Will there be an increase/decrease in staffing as a result of this? No.

- ii. Will operating costs increase/decrease? Please be specific. Operating costs will initially decrease since the replacement equipment will be refurbished.
- iii. Is there a need for training due to the purchase of this item? No
- iv. If so, have you included that in your operating budget?
- v. Is there a need for the purchase of licenses to use the equipment? No
- vi. If so, has that been included in your operating budget?
- vii. Are there ongoing maintenance contracts required for this item? No
- viii. If so, has that been included in your operating budget?

4. TIMING OF PROJECT

- a. What else might need to be done in order to implement the project for the coming fiscal year? **Nothing**
- b. Do you need approvals from any other group (Planning Board, Historic District Commission, Conservation Commission etc). **No**
 - i. If yes, when do you plan to do that?
- c. How long will it take to complete the project? Six months
- d. Can the project be phased? No
 - i. If so, please address the advantages and disadvantages
 - ii. If this is an ongoing phased project, please include in the title the year we are in (for example, with Kal Wal at BHS, "year 4 of a 5 year plan" or whatever is appropriate).
- e. Does the project need to be bid? Existing state bids will be utilized.
 - i. If so, have the bid specs been written? Yes
- f. When do you plan to bid this? July 2017

5. LIFE EXPECTANCY OF THIS ITEM/PROJECT

a. Is this a one-time purchase, or will it need to be replaced in the future?
 Approximate 16 year additional life expectancy

6. FUNDING

- a. Can this be legally bonded? Yes
- b. Are there any grants or reimbursements available for this purchase? No
- c. If this is a replacement, how was the existing item funded (CBC, grant, donation, operating funds, other?) **CBC**

DPW CBC REQUEST FOR FY 2018 FROM GENERAL FUND

1. WHAT IS THE PROJECT/ITEM

Highway Division - Sidewalk Maintenance

- a New proposal No
- b Replacement for something already existing Yes
 - i. If a replacement, year existing item was purchased Varies
 - ii. If a replacement, plan for existing item (auction, discard, reuse by other person in department, reuse by other department) n/a
- c Additional enhancement for something existing No

2. REASON FOR THE REQUEST -

Sidewalk repair is one of the most common requests from residents and businesses. DPW has over 1,000 requests for repair and we have estimated that a minimum of \$150,000 annually is needed for at least ten years to significantly reduce the backlog.

3. COST \$210,000

- a. How was cost arrived at? (State Bid list, actual bid, professional cost estimate, based on past experience, wild guess) **Annual bid**
- b. How recent is the estimate? (if older than a couple of years, you will be asked to refine or confirm it as current and that process could jeopardize the potential for getting on the list) **Current**
- c. What effect will this have on future operating budgets? None
 - i. Will there be an increase/decrease in staffing as a result of this? No.
 - ii. Will operating costs increase/decrease? Please be specific. Sustained reinvestment in the infrastructure will improve the quality of Town assets and control long-term costs.
 - iii. Is there a need for training due to the purchase of this item? No
 - iv. If so, have you included that in your operating budget?
 - v. Is there a need for the purchase of licenses to use the equipment? No
 - vi. If so, has that been included in your operating budget?
 - vii. Are there ongoing maintenance contracts required for this item? No
 - viii. If so, has that been included in your operating budget?

- a. What else might need to be done in order to implement the project for the coming fiscal year? **Nothing**
- b. Do you need approvals from any other group (Planning Board, Historic District Commission, Conservation Commission etc). **No**
 - i. If yes, when do you plan to do that?
- c. How long will it take to complete the project? Ongoing during the construction season

d. Can the project be phased? n/a

i. If so, please address the advantages and disadvantages

ii. If this is an ongoing phased project, please include in the title the year we are in (for example, with Kal Wal at BHS, "year 4 of a 5 year plan" or whatever is appropriate).

e. Does the project need to be bid? Yes

- i. If so, have the bid specs been written? Yes
- f. When do you plan to bid this? July 2017

5. LIFE EXPECTANCY OF THIS ITEM/PROJECT

a. Is this a one-time purchase, or will it need to be replaced in the future? Varies but generally 25 to 75 year life expectancy.

6. FUNDING

a. Can this be legally bonded? Yes

b. Are there any grants or reimbursements available for this purchase? No

c. If this is a replacement, how was the existing item funded (CBC, grant, donation, operating funds, other?) **CBC and Operating Budget**

DPW CBC REQUEST FOR FY 2018 FROM GENERAL FUND

1. WHAT IS THE PROJECT/ITEM -

Parks Department - Replace 2005 Chevy Silverado Pick-up Truck #103

- a. New proposal No
- b. Replacement for something already existing Yes
 - i. If a replacement, year existing item was purchased. 2005
 - ii. If a replacement, plan for existing item (auction, discard, reuse by other person in department, reuse by other department) **Trade-in**
- c. Additional enhancement for something existing No

2. REASON FOR THE REQUEST - Routine replacement of a 2005 Pick-up Truck

3. COST - \$45,300

- b. How was cost arrived at? (State Bid list, actual bid, professional cost estimate, based on past experience, wild guess) **State bid**
- c. How recent is the estimate? (if older than a couple of years, you will be asked to refine or confirm it as current and that process could jeopardize the potential for getting on the list) **Current**
- d. What effect will this have on future operating budgets? None
 - i. Will there be an increase/decrease in staffing as a result of this? No
 - ii. Will operating costs increase/decrease? Please be specific. No
 - iii. Is there a need for training due to the purchase of this item? No If so, have you included that in your operating budget?
 - iv. Is there a need for the purchase of licenses to use the equipment? No
 - v. If so, has that been included in your operating budget?
 - vi. Are there ongoing maintenance contracts required for this item? No
 - vii. If so, has that been included in your operating budget?

- e. What else might need to be done in order to implement the project for the coming fiscal year? **Nothing**
- f. Do you need approvals from any other group (Planning Board, Historic District Commission, Conservation Commission etc). **No**
 - i. If yes, when do you plan to do that?
- g. How long will it take to complete the project? Six months
- h. Can the project be phased? No
 - i. If so, please address the advantages and disadvantages
 - ii. If this is an ongoing phased project, please include in the title the year we are in (for example, with Kal Wal at BHS, "year 4 of a 5 year plan" or whatever is appropriate).
- i. Does the project need to be bid? Utilize state bid
 - i. If so, have the bid specs been written? Yes
 - ii. When do you plan to bid this? July 2017

5. LIFE EXPECTANCY OF THIS ITEM/PROJECT

j. Is this a one-time purchase, or will it need to be replaced in the future? Replacement with an approximate 8 year life expectancy.

6. FUNDING

- k. Can this be legally bonded? Yes
- 1. Are there any grants or reimbursements available for this purchase? No
- m. If this is a replacement, how was the existing item funded (CBC, grant, donation, operating funds, other?) **CBC**

TOWN OF BELMONT, MA ANNUAL BUDGET FY18 CAPITAL OUTLAY DETAIL

FUND: CAPITAL

PROGRAM: DEPARTMENT OF PUBLIC WORKS

	DESCRIPTION	NEED BASIS	PRIORITY R/A	# REQ.	UNIT COST	TOTAL COST	LESS TRADE IN	DEPT REQUEST	TOWN ADMIN	WARRANT COMM
HWY	#34 Snowfighter Conversion	1	R	11	\$44,940	\$44,940	\$0	\$44,940		
PKS	#103 1 Ton 4WD Pickup Truck	2	R	11	\$45,300	\$45,300	\$0	\$45,300		
HWY	Sidewalk Maintenance	3	R	1	\$210,000	\$210,000	\$0	\$210,000		
						\$0	\$0	\$0		
						\$0	\$0	\$0		
						\$0	\$0	\$0		
						\$0	\$0	\$0		
						\$0	\$0	\$0		
						\$0	\$0	\$0		
	TOTALS					\$300,240	\$0	\$300,240		

PUBLIC WORKS DEPARTMENT - GENERAL FUND SCHEDULE OF MAJOR CAPITAL EQUIPMENT REPLACEMENT COSTS - "PRESENT DAY"

	FY 2018	DIV	FY 2019	DIV	FY 2020	DIV	j	FY 2021	DIV	FY:	2022	DIV		FY 2023	DIV
#	34 - Snowfig Conversion (C) 44,940		#32 - Snow Convers (C) \$ 44,94	ion HWY	#36 - Snov Conver (C) \$ 44,9	rsion HWY	M \$	#74 - 9' laterial Spre (C) 15,000	HWY	((C) -	HWY	N \$	#73 - 9' //aterial Sprea (C) 15,000	HWY
\$	Sidewalk Maintenand (C) 210,000	e H W Y	Sidewa Maintena (C) \$ 215,25	nce HWY	Sidew Mainter (C) \$ 220,6	nance HWY	\$	Sidewalk Maintenand (C) 226,147	ce HWY	Ma (Sidewalk aintenan C) 231,801	ce HWY	\$	Sidewalk Maintenand (C) 237,596	e HWY
	(C)	HWY	#62 - 1.5 Sidewalk F (C) \$ 15,75	Roller HWY	#6 Centra Utility T (C) \$ 66,3	Truck HWY	\$	(C) -	HWY	\$	C) -	HWY	\$	(C)	Н W Y
\$	(C)	HWY	(C)	HWY	(C)	HWY	\$	(C)	НWY	(C) -	HWY	\$	(C)	HWY
\$	(C)	HWY	(C)	HWY	(C)	HWY	\$	(C)	HWY	· (C) -	HWY	\$	(C) -	HWY

PUBLIC WORKS DEPARTMENT - GENERAL FUND SCHEDULE OF MAJOR CAPITAL EQUIPMENT REPLACEMENT COSTS - "PRESENT DAY"

FY	2018	DIV	 FY 2019	DIV		FY 2020	DIV		FY 2021	DIV	 FY 2022	DIV	F	Y 2023	DIV
P	3 - 1 Ton 4 lickup Truc (C)	k	#108 - Sma ront End Loa (C)	der PKS	#106 - 19,000 GVW Dump Truck (C) PKS \$ 79,900 \$			Toro 16 Foot (Riding Mowe (C)	er PKS	104 - 1 Ton 4 Pickup Truc (C)	1		(C)	PKS	
\$	45,300		\$ 86,800		\$	79,900		\$	73,500		\$ 45,300				
	(C)	PKS	\$ (C)	PKS	\$	(C)	PKS	\$_	(C)	PKS	\$ (C)	PKS	\$	(C) <u>-</u>	PKS
\$	(C) -	REC	\$ (C)	REC	\$	(C) -	REC	\$	(C)	REC	\$ (C)	REC	\$	(C) -	REC
	(C)	CEM	\$ #120 - Load Backhoe (C) 121,000			7 - 1 Ton 4WE Pick Up (C) 45,300		[#119 - 19,000 (Dump Truck (C) 79,900		\$ (C) -	CEM	\$	(C)	CEM
\$	_	CEM	\$ -	CEM	\$	-	CEM	\$	· -	CEM	\$ · · · · · · · · · · · · · · · · · · ·	CEM	\$		CEM
\$	254,940	HWY	\$ 275,940	HWY	\$	331,871	HWY	\$	241,147	HWY	\$ 231,801	HWY	\$	252,596	HWY
Section III			86,800			79,900				PKS	 45,300	PKS	\$	_	PKS
ion I		REC	\$ _	REC	\$		REC	\$	-	REC	\$ · m	REC	\$	-	REC
II Pag		CEM	\$ 121,000	CEM	\$	45,300	CEM	\$	79,900	CEM	\$ ~	CEM	\$		CEM
	300,240		\$ 483,740		\$	457,071		\$	394,547		\$ 277,101		\$	252,596	



Department of Public Works

Memo

To: Capital Budget Committee

From: Jay Marcotte MPA, Director

Date: January 11, 2017

Re: Supplemental Information for the FY18 DPW Water and Sewer Capital

Requests

Since the Water and Sewer budgets are supported by Enterprise Funds I have submitted this separate supplemental memo for these Capital requests.

It is important to note that all Public Works vehicles are shared within Public Works as well as with any other Town department that needs a vehicle (i.e. – Light, School, Health, Fire, and Building Services). In addition, it is Town policy to "procure the most fuel efficient and economical vehicles necessary for the purpose for which they are intended". The DPW follows this policy for every vehicle and considers hybrid and alternative fuel vehicles when possible.

The following are the FY 2018 Water and Sewer Enterprise Fund requests:

Water Program (Water Division)

1. Water System Improvement Program - \$250,000

In 1995 the former Board of Water Commissioners, after a competitive process, selected Weston & Sampson Engineers, Inc. to perform a comprehensive evaluation of the water distribution system which serves the Town. The primary focus of the study was the water distribution systems' age, condition, chronic water main break events and persistent water quality concerns. The study concluded that considerable work was necessary to correct problems and deficiencies and to insure a reliable supply of clean water to our customers, now and in the future. Another important, often overlooked, necessity is the systems ability to deliver adequate quantities of water to fight potential fires. To achieve these goals

Weston and Sampson recommended that all unlined cast iron water main be replaced with new cement lined ductile iron pipe as well as other system improvements. Unlined cast iron pipe originally comprised approximately 40% of the system which serves about 60% of the population of Belmont. Considering system wide pipe age and condition, as well as economic factors, it was recommended that this work be done in annual construction projects with a completion date 30 years after commencement. This plan was approved and initially funded by the 1995 Town Meeting. A 2005 update of this study found that the Town was not investing enough annually to complete this important work in the It was recommended that a minimum remaining 20 years of the program. investment of \$1.2M in the water infrastructure was necessary increasing by 3% annually. Given the economy and the construction atmosphere we annually adjust the capital investment financial strategy to maintain our goal of completing the necessary work within the program time frame while maintaining reasonable rate increases for our customers.

2. Water System Improvement Program Bond Repayment - \$718,621 (FY18 debt service)

An integral part of the capital financial plan for the water system is utilizing the available \$3.477M MWRA no-interest loans that are available to Belmont through the Local Water System Assistance Program (LWSAP). The LWSAP is an incentive program based on the miles of unlined water main in our system to assist communities in the MWRA system to replace unlined pipe with lined pipe to maintain water quality to customers. This program is supplemented by the municipal bond authorization from 2012 Town Meeting. For FY17, we request approval to borrow \$477,000 from the MWRA LWSAP Program. This will exhaust the MWRA LWSAP loan with the hopes of a similar investment loan program from the MWRA in the near future.

3. Smart Meter Replacement Program - \$1,100,000 (Phase II)

The Water and Sewer Division is seeking to upgrade the current Automatic Meter Reading (AMR) system with an Advanced Meter Infrastructure (AMI) system. This upgrade to our system is part of our maintenance and upkeep schedule and will allow for instant consumption reads, leak detection, efficiencies in billing and customer access to their account.

- Life Expectancy 15-20 years
- 3 year maintenance cost N/A
- Mileage/Hours N/A
- Use (daily or weekly) Daily

4. Replace a 2008 Emergency Service Van #80 - \$35,200

The request is to replace a 2008 Econoline Van that is equipped to serve all levels of emergency situations as it pertains to the Water Division.

- Life Expectancy of replacement 8 years
- 3-year maintenance cost for #80- \$4,654.23
- Mileage on #80 –

57,602 miles

Use (daily or weekly) –

Daily

Sanitary Sewer Maintenance Program (Highway Division)

Replace a 2008 – 19,000 GVW Dump Truck (#9) - \$79,900
 The request is to replace a 2008 --19,000 GVW Dump Truck.

• Life Expectancy of replacement – 8 years

• 3-year maintenance cost for #9 -- \$19,767.32

Mileage on #9 – 29,907 miles

• Use (daily or weekly) – Daily

2. Replace a 2003 -- 37,000 GVW Dump Truck #18 - \$130,305

The request is to replace a 2003 –37,000 GVW Dump Truck

• Life Expectancy of replacement – 10 – 15 years

• 3-year maintenance cost of #18 -- \$10,836.95

• Mileage/Hours on #18 – 37,960 miles

• Use (daily or weekly) – Varies -- Daily

3. Smart Meter Replacement Program - \$500,000 (Phase II)

The Water and Sewer Division is seeking to upgrade the current Automatic Meter Reading (AMR) system with an Advanced Meter Infrastructure (AMI) system. This upgrade to our system is part of our maintenance and upkeep schedule and will allow for instant consumption reads, leak detection, efficiencies in billing and customer access to their account.

- Life Expectancy 15-20 years
- 3 year maintenance cost N/A
- Mileage/Hours N/A
- Use (daily or weekly) Daily



Department of Public Works

Memo

To: Capital Budget Committee

From: Jay Marcotte, Director

Date: January 9, 2017

Re: FY 2018 DPW Water and Sewer Capital Request from Enterprise Funds

DPW CBC REQUEST FOR FY 18 FROM WATER ENTERPRISE FUND

1. WHAT IS THE PROJECT/ITEM - Water System Improvement Program

a. New proposal No

b. Replacement for something already existing Yes

i. If a replacement, year existing item was purchased Existing water mains generally installed in the period from 1887 to 1928

ii. If a replacement, plan for existing item (auction, discard, reuse by other person in department, reuse by other department) - n/a

c. Additional enhancement for something existing - No

2. REASON FOR THE REQUEST –

In 1995 the former Board of Water Commissioners, after a competitive process, selected Weston & Sampson Engineers, Inc. to perform a comprehensive evaluation of the water distribution system which serves the Town. The primary focus of the study was the water distribution systems' age, condition, chronic water main break events and persistent water quality concerns. The study concluded that considerable work was necessary to correct problems and deficiencies and to insure a reliable supply of clean water to our customers, now and in the future. Another important, often overlooked, necessity is the systems ability to deliver adequate quantities of water to fight potential fires. To achieve these goals Weston and Sampson recommended that all unlined cast iron water main be replaced with new cement lined ductile iron pipe as well as other system improvements. Unlined cast iron pipe originally comprised approximately 40% of the system which serves about 60% of the population of Belmont. Considering system wide pipe age and condition, as well as economic factors, it was recommended that this work be done in annual construction projects with a

completion date 30 years after commencement. This plan was approved and initially funded by the 1995 Town Meeting. A 2005 update of this study found that the Town was not investing enough annually to complete this important work in the remaining 20 years of the program. It was recommended that a minimum investment of \$1.2M in the water infrastructure was necessary increasing by 3% annually. Given the economy and the construction atmosphere we annually adjust the capital investment financial strategy to maintain our goal of completing the necessary work within the program time frame while maintaining reasonable rate increases for our customers.

3. COST \$250,000

- d. How was cost arrived at? (State Bid list, actual bid, professional cost estimate, based on past experience, wild guess) **Professional engineers cost estimate**
- e. How recent is the estimate? (if older than a couple of years, you will be asked to refine or confirm it as current and that process could jeopardize the potential for getting on the list) **Current**
- f. What effect will this have on future operating budgets? None
 - i. Will there be an increase/decrease in staffing as a result of this? No
 - ii. Will operating costs increase/decrease? Please be specific. Operating costs should slightly decrease with new pipe but exact amounts are difficult to quantify.
 - iii. Is there a need for training due to the purchase of this item? No If so, have you included that in your operating budget?
 - iv. Is there a need for the purchase of licenses to use the equipment? No If so, has that been included in your operating budget?
 - v. Are there ongoing maintenance contracts required for this item? No If so, has that been included in your operating budget?

- g. What else might need to be done in order to implement the project for the coming fiscal year? **Nothing**
- h. Do you need approvals from any other group (Planning Board, Historic District Commission, Conservation Commission etc). **No**
 - i. If yes, when do you plan to do that?
- i. How long will it take to complete the project? 6-8 months
- j. Can the project be phased? No
 - i. If so, please address the advantages and disadvantages
 - ii. If this is an ongoing phased project, please include in the title the year we are in (for example, with Kal Wal at BHS, "year 4 of a 5 year plan" or whatever is appropriate).
- k. Does the project need to be bid? Yes
 - i. If so, have the bid specs been written? Yes
 When do you plan to bid this? Spring 2017

5. LIFE EXPECTANCY OF THIS ITEM/PROJECT

1. Is this a one time purchase, or will it need to be replaced in the future?

Life expectancy of 75 to 100 years

6. FUNDING

- m. Can this be legally bonded? Yes, currently utilizing MWRA no-interest loans and municipal bonds funded by user fees.
- n. Are there any grants or reimbursements available for this purchase? No
- o. If this is a replacement, how was the existing item funded (CBC, grant, donation, operating funds, other?) **Enterprise Funds**

DPW CBC REQUEST FOR FY18 FROM WATER ENTERPRISE FUND

1. WHAT IS THE PROJECT/ITEM - Water Division - Water Main Bond Repayment

a. New proposal No

b. Replacement for something already existing Yes

- i. If a replacement, year existing item was purchased. Existing water mains generally installed in the period from 1887 to 1928
- ii. If a replacement, plan for existing item (auction, discard, reuse by other person in department, reuse by other department) n/a
- c. Additional enhancement for something existing No

2. REASON FOR THE REQUEST

An integral part of the capital financial plan for the water system is utilizing the available \$3.477M MWRA no-interest loans that are available to Belmont through the Local Water System Assistance Program (LWSAP). The LWSAP is an incentive program based on the miles of unlined water main in our system to assist communities in the MWRA system to replace unlined pipe with lined pipe to maintain water quality to customers. This program is supplemented by the municipal bond authorization from 2012 Town Meeting. For FY 18, we request approval to borrow \$477,000 from the MWRA LWSAP Program and are able to defer borrowing from our municipal bond this fiscal year.

3. COST - \$718,621 (FY 18 debt service)

- a. How was cost arrived at? (State Bid list, actual bid, professional cost estimate, based on past experience, wild guess)
 Bond repayment schedule as part of financial planning program.
- b. How recent is the estimate? (if older than a couple of years, you will be asked to refine or confirm it as current and that process could jeopardize the potential for getting on the list) **Professional engineers cost estimate**
- c. What effect will this have on future operating budgets? No
 - i. Will there be an increase/decrease in staffing as a result of this? No
 - ii. Will operating costs increase/decrease? Please be specific. Operating costs should slightly decrease with new pipe but exact amounts are difficult to quantify.
 - iii. Is there a need for training due to the purchase of this item? No If so, have you included that in your operating budget?
 - iv. Is there a need for the purchase of licenses to use the equipment? No If so, has that been included in your operating budget?
 - v. Are there ongoing maintenance contracts required for this item? No If so, has that been included in your operating budget?

- a. What else might need to be done in order to implement the project for the coming fiscal year? **Nothing**
- b. Do you need approvals from any other group (Planning Board, Historic District Commission, Conservation Commission etc). No
 - i. If yes, when do you plan to do that?
- c. How long will it take to complete the project? 6-8 months
- d. Can the project be phased? No
 - i. If so, please address the advantages and disadvantages
 - ii. If this is an ongoing phased project, please include in the title the year we are in (for example, with Kal Wal at BHS, "year 4 of a 5 year plan" or whatever is appropriate).
- e. Does the project need to be bid? Yes
 - i. If so, have the bid specs been written? Yes
- f. When do you plan to bid this? Spring 2017
- 5. LIFE EXPECTANCY OF THIS ITEM/PROJECT
 - a. Is this a one time purchase, or will it need to be replaced in the future? Life expectancy of 75 to 100 years

6. FUNDING

- a. Can this be legally bonded? Yes, currently utilizing no- MWRA interest loan and municipal bonds for this project.
- b. Are there any grants or reimbursements available for this purchase? No
- c. If this is a replacement, how was the existing item funded (CBC, grant, donation, operating funds, other?) **Enterprise Funds**

DPW CBC REQUEST FOR FY 18 FROM WATER ENTERPRISE FUND

1. WHAT IS THE PROJECT/ITEM - Emergency Service Van #80

- a. New proposal No
- b. Replacement for something already existing Yes
 - i. If a replacement, year existing item was purchased. 2008
 - ii. If a replacement, plan for existing item (auction, discard, reuse by other person in department, reuse by other department) **Trade-in**
- c. Additional enhancement for something existing No
- d. REASON FOR THE REQUEST Routine replacement of a 2008 Econoline Emergency Service Van

2. COST - \$35,200

- a. How was cost arrived at? (State Bid list, actual bid, professional cost estimate, based on past experience, wild guess) **State bid**
- b. How recent is the estimate? (if older than a couple of years, you will be asked to refine or confirm it as current and that process could jeopardize the potential for getting on the list) **Current**
- c. What effect will this have on future operating budgets? None
 - i. Will there be an increase/decrease in staffing as a result of this? No
 - ii. Will operating costs increase/decrease? Please be specific. No
 - iii. Is there a need for training due to the purchase of this item? No If so, have you included that in your operating budget?
 - iv. Is there a need for the purchase of licenses to use the equipment? No
 - v. If so, has that been included in your operating budget?
 - vi. Are there ongoing maintenance contracts required for this item? No
 - vii. If so, has that been included in your operating budget?

- a. What else might need to be done in order to implement the project for the coming fiscal year? **Nothing**
- b. Do you need approvals from any other group (Planning Board, Historic District Commission, Conservation Commission etc). **No**
 - i. If yes, when do you plan to do that?
- c. How long will it take to complete the project? Six months
- d. Can the project be phased? No
 - i. If so, please address the advantages and disadvantages
 - ii. If this is an ongoing phased project, please include in the title the year we are in (for example, with Kal Wal at BHS, "year 4 of a 5 year plan" or whatever is appropriate).
- e. Does the project need to be bid? Utilize state bid
 - i. If so, have the bid specs been written? Yes

ii. When do you plan to bid this? July 2017

4. LIFE EXPECTANCY OF THIS ITEM/PROJECT

a. Is this a one-time purchase, or will it need to be replaced in the future? Replacement with an approximate 15 year life expectancy.

5. FUNDING

- a. Can this be legally bonded? Yes
- b. Are there any grants or reimbursements available for this purchase? No
- c. If this is a replacement, how was the existing item funded (CBC, grant, donation, operating funds, other?) **Enterprise Fund**

DPW CBC REQUEST FOR FY 18 FROM WATER ENTERPRISE FUND

- 1. WHAT IS THE PROJECT/ITEM Smart Meter Replacement Program Phase II
 - d. New proposal YES
 - e. Replacement for something already existing
 - iii. If a replacement, year existing item was purchased.
 - iv. If a replacement, plan for existing item (auction, discard, reuse by other person in department, reuse by other department)
 - f. Additional enhancement for something existing YES
- 2. REASON FOR THE REQUEST -Upgrade meter reading system for both Water and Sewer Enterprise Funds. Funds will be split 60/40 and funded through two (2) fiscal years using retained earnings from the Water and Sewer Enterprise Funds.
- 3. COST \$1,100,000
 - a. How was cost arrived at? (State Bid list, actual bid, professional cost estimate, based on past experience, wild guess) **State bid**
 - b. How recent is the estimate? (if older than a couple of years, you will be asked to refine or confirm it as current and that process could jeopardize the potential for getting on the list) **Current**
 - c. What effect will this have on future operating budgets? N/A
 - i. Will there be an increase/decrease in staffing as a result of this? N/A
 - ii. Will operating costs increase/decrease? Please be specific. N/A
 - iii. Is there a need for training due to the purchase of this item? No If so, have you included that in your operating budget?
 - iv. Is there a need for the purchase of licenses to use the equipment? No
 - v. If so, has that been included in your operating budget?
 - vi. Are there ongoing maintenance contracts required for this item? Yes, through Belmont Light
 - vii. If so, has that been included in your operating budget? Yes

- a. What else might need to be done in order to implement the project for the coming fiscal year? This is the final phase of implementation that will start in the fall of FY18
- b. Do you need approvals from any other group (Planning Board, Historic District Commission, Conservation Commission etc). No
 - i. If yes, when do you plan to do that?
- c. How long will it take to complete the project? 12-18 months
- d. Can the project be phased? YES
 - i. If so, please address the advantages and disadvantages

- ii. If this is an ongoing phased project, please include in the title the year we are in (for example, with Kal Wal at BHS, "year 4 of a 5 year plan" or whatever is appropriate).
- e. Does the project need to be bid? Utilize state bid
 - i. If so, have the bid specs been written? Yes
 - ii. When do you plan to bid this? July 2017

5. LIFE EXPECTANCY OF THIS ITEM/PROJECT

a. Is this a one-time purchase, or will it need to be replaced in the future? Replacement with an approximate 15-20 year life expectancy.

6. FUNDING

- a. Can this be legally bonded? Yes
- b. Are there any grants or reimbursements available for this purchase? No
- c. If this is a replacement, how was the existing item funded (CBC, grant, donation, operating funds, other?) **Enterprise Fund**

DPW CBC REQUEST FOR FY 18 FROM SEWER ENTERPRISE FUND

1. WHAT IS THE PROJECT/ITEM - Replace a 2008 -19,000 GVW Dump Truck #9

- g. New proposal No
- h. Replacement for something already existing Yes
 - v. If a replacement, year existing item was purchased. 2008
 - vi. If a replacement, plan for existing item (auction, discard, reuse by other person in department, reuse by other department) **Trade-in**
- i. Additional enhancement for something existing No

2. REASON FOR THE REQUEST - Routine replacement of a 2008 Dump Truck

3. COST - \$79,900

- d. How was cost arrived at? (State Bid list, actual bid, professional cost estimate, based on past experience, wild guess) **State bid**
- e. How recent is the estimate? (if older than a couple of years, you will be asked to refine or confirm it as current and that process could jeopardize the potential for getting on the list) **Current**
- f. What effect will this have on future operating budgets? None
 - i. Will there be an increase/decrease in staffing as a result of this? No
 - ii. Will operating costs increase/decrease? Please be specific. No
 - iii. Is there a need for training due to the purchase of this item? **No** If so, have you included that in your operating budget?
 - iv. Is there a need for the purchase of licenses to use the equipment? No
 - v. If so, has that been included in your operating budget?
 - vi. Are there ongoing maintenance contracts required for this item? No
 - vii. If so, has that been included in your operating budget?

- g. What else might need to be done in order to implement the project for the coming fiscal year? **Nothing**
- h. Do you need approvals from any other group (Planning Board, Historic District Commission, Conservation Commission etc). **No**
 - i. If yes, when do you plan to do that?
- i. How long will it take to complete the project? Six months
- j. Can the project be phased? No
 - i. If so, please address the advantages and disadvantages
 - ii. If this is an ongoing phased project, please include in the title the year we are in (for example, with Kal Wal at BHS, "year 4 of a 5 year plan" or whatever is appropriate).
- k. Does the project need to be bid? Utilize state bid

- i. If so, have the bid specs been written? Yes
- ii. When do you plan to bid this? July 2017

1. Is this a one-time purchase, or will it need to be replaced in the future? Replacement with an approximate 8 year life expectancy.

- m. Can this be legally bonded? Yes
- n. Are there any grants or reimbursements available for this purchase? No
- o. If this is a replacement, how was the existing item funded (CBC, grant, donation, operating funds, other?) Enterprise Fund

DPW CBC REQUEST FOR FY 18 FROM SEWER ENTERPRISE FUND

1. WHAT IS THE PROJECT/ITEM - Replace a 2003 - 37,000 GVW Dump Truck #18

- j. New proposal No
- k. Replacement for something already existing Yes
 - vii. If a replacement, year existing item was purchased. 2003
 - viii. If a replacement, plan for existing item (auction, discard, reuse by other person in department, reuse by other department) **No**
- 1. Additional enhancement for something existing No

2. REASON FOR THE REQUEST - Routine replacement of a Dump Truck

COST - \$130,305

- p. How was cost arrived at? (State Bid list, actual bid, professional cost estimate, based on past experience, wild guess) **State bid**
- q. How recent is the estimate? (if older than a couple of years, you will be asked to refine or confirm it as current and that process could jeopardize the potential for getting on the list) **Current**
- r. What effect will this have on future operating budgets? None
 - i. Will there be an increase/decrease in staffing as a result of this? No
 - ii. Will operating costs increase/decrease? Please be specific. No
 - iii. Is there a need for training due to the purchase of this item? No If so, have you included that in your operating budget?
 - iv. Is there a need for the purchase of licenses to use the equipment? No
 - v. If so, has that been included in your operating budget?
 - vi. Are there ongoing maintenance contracts required for this item? No
 - vii. If so, has that been included in your operating budget?

3. TIMING OF PROJECT -

- i. What else might need to be done in order to implement the project for the coming fiscal year? **Nothing**
- ii. Do you need approvals from any other group (Planning Board, Historic District Commission, Conservation Commission etc). **No**
- iii. If yes, when do you plan to do that?
- iv. How long will it take to complete the project? Six months
- v. Can the project be phased? No
- vi. If so, please address the advantages and disadvantages
- vii. If this is an ongoing phased project, please include in the title the year we are in (for example, with Kal Wal at BHS, "year 4 of a 5 year plan" or whatever is appropriate).

- viii. Does the project need to be bid? Utilize state bid
- ix. If so, have the bid specs been written? Yes
- x. When do you plan to bid this? July 2017

a. Is this a one-time purchase, or will it need to be replaced in the future? Replacement with an approximate 10-15 year life expectancy.

- a. Can this be legally bonded? Yes
- b. Are there any grants or reimbursements available for this purchase? No
- c. If this is a replacement, how was the existing item funded (CBC, grant, donation, operating funds, other?) **Enterprise Fund**

DPW CBC REQUEST FOR FY18 FROM SEWER ENTERPRISE FUND

- 1. WHAT IS THE PROJECT/ITEM Smart Meter Replacement Program Phase II
 - a. New proposal YES
 - b. Replacement for something already existing
 - c. If a replacement, year existing item was purchased.
 - d. If a replacement, plan for existing item (auction, discard, reuse by other person in department, reuse by other department)
 - e. Additional enhancement for something existing YES
- 2. REASON FOR THE REQUEST -Upgrade meter reading system for both Water and Sewer Enterprise Funds. Funds will be split 50/50 and funded through two (2) fiscal years using retained earnings from the Water and Sewer Enterprise Funds.
- 3. COST \$500,000
 - s. How was cost arrived at? (State Bid list, actual bid, professional cost estimate, based on past experience, wild guess) **State bid**
 - t. How recent is the estimate? (if older than a couple of years, you will be asked to refine or confirm it as current and that process could jeopardize the potential for getting on the list) **Current**
 - u. What effect will this have on future operating budgets? N/A
 - i. Will there be an increase/decrease in staffing as a result of this? N/A
 - ii. Will operating costs increase/decrease? Please be specific. N/A
 - iii. Is there a need for training due to the purchase of this item? **No**If so, have you included that in your operating budget?
 - iv. Is there a need for the purchase of licenses to use the equipment? No
 - v. If so, has that been included in your operating budget?
 - vi. Are there ongoing maintenance contracts required for this item? Yes, through Belmont Municipal Light
 - vii. If so, has that been included in your operating budget? Yes

4. TIMING OF PROJECT

- a. What else might need to be done in order to implement the project for the coming fiscal year? This is the first phase of 2, implementation will start in FY18
- b. Do you need approvals from any other group (Planning Board, Historic District Commission, Conservation Commission etc). **No**
 - i. If yes, when do you plan to do that?
- c. How long will it take to complete the project? 12-18 months
- d. Can the project be phased? YES
 - i. If so, please address the advantages and disadvantages

- ii. If this is an ongoing phased project, please include in the title the year we are in (for example, with Kal Wal at BHS, "year 4 of a 5 year plan" or whatever is appropriate).
- e. Does the project need to be bid? Utilize state bid
 - i. If so, have the bid specs been written? Yes
 - ii. When do you plan to bid this? July 2017

a. Is this a one-time purchase, or will it need to be replaced in the future? Replacement with an approximate 15-20 year life expectancy.

- a. Can this be legally bonded? Yes
- b. Are there any grants or reimbursements available for this purchase? No
- c. If this is a replacement, how was the existing item funded (CBC, grant, donation, operating funds, other?) **Enterprise Fund**

TOWN OF BELMONT, MA ANNUAL BUDGET FY18 CAPITAL OUTLAY DETAIL

FUND: SEWER ENTERPRISE
DPW - HIGHWAY DIVISION
PROGRAM: SANITARY SEWER MAINT.

DESCRIPTION	NEED	PRIORITY	#	UNIT	TOTAL	LESS	DEPT	TOWN	WARRANT	ADOPTED
DESCRIPTION	BASIS	R/A	REQ.	COST	COST	TRADE IN	REQUEST	ADMIN	COMM	BDGT
#9, 19,000 GVW Dump Truck	1	 R	1	\$79,900	\$79,900	\$0	\$79,900			
#18, 37,000 GVW Dump	2	R	1	\$130,305	\$130,305	\$0	\$130,305			
Smart Meter Program - Phase II	3	R	1	\$500,000	\$500,000	\$0	\$500,000			
TOTALS				\$710,205	\$710,205	\$0	\$710,205			

PUBLIC WORKS DEPARTMENT - SEWER ENTERPRISE SCHEDULE OF MAJOR CAPITAL EQUIPMENT REPLACEMENT COSTS - "PRESENT DAY"

	FY 2018	DIV		FY 2019	DIV	<u>]</u>	FY 2020	<u>)</u>	DIV		FY 2021	<u>L</u>	DIV		FY 2022	ļ	DIV		FY 2023	DIV
#	9 - 19,000 C			Air Compress		#30) - Stree	t Swe	eeper		#23 Fro		nd		#4 - 1 Tor		l l		#24 Front E	ind
	Dump True			Without Whe			(05)				Loa	der	111477		Pickup T				Loader	HWY
	(SE)	HWY		(SE)	HWY		(SE)	000	HWY	Φ	(SE)	000	HWY	φ	(SE) 45,3		YWF	\$	(SE) 204,000	1
	79,900)	\$	26,250		\$	196,	,800		\$	204,	,000		\$				Ψ	204,000	
#	18 - 37,00 C	3VW		#3 - 1/2 To										:	#7 - 1 Tor					
	Dump Tru			Pick Up Tru											Pickup 7				(05)	LUADA
	(SE)	HWY		(SE)	HWY		(SE)		HWY	•	(SE)		HWY	Ф	(SE)		YWF		(SE)	HWY
\$	130,305	5	\$	34,970		\$				\$				\$.	45,3	00				
Sm	art Meter Pi	rogram		#53 Sewe	r															
	Phase II			Rodder											·				(0.5)	LUADA
	(SE)	HWY		(SE)	HWY		(SE)		HWY	_	(SE)		HWY		(SE)	ŀ	YWF		(SE)	HWY
\$	500,000)	\$	33,700		\$		_		\$		-		\$	•			\$		
			Tr	apelo Road C	ulvert															
				Replaceme																
	(SE)	HWY		(SE)	HWY		(SE)		HWY		(SE)		HWY		(SE)	ŀ	YWF		(SE)	HWY
\$	M		\$_	500,000		\$		-		\$		_		\$_		-		\$		
	(SE)	HWY		(SE)	HWY		(SE)		HWY		(SE)		HWY		(SE)	ŀ	HWY		(SE)	HWY
\$	-		\$	_		\$				\$		_		\$		-		\$		
	(SE)	HWY		(SE)	HWY		(SE)		HWY		(SE)		HWY		(SE)	ŀ	HWY	ı	(SE)	HWY
\$	e -		\$	_		\$		_		\$		_		\$				\$	· <u>-</u>	
	ection -		Π											ĺ						
	_																			
	≡ ⊕(SE)	HWY		(SE)	HWY		(SE)		HWY		(SE)		HWY		(SE)	ŀ	HWY		(SE)	HWY
\$	<u>n</u> -		\$	-		\$	()	~		\$	()	_		\$		-		\$		
Ψ	age -		ιΨ_			<u> </u>				<u> </u>				•						
	ω	-	Ф.	504.000		<u></u>	100	900		\$	204	,000		\$	90,6	300		\$	204,000)
\$	N 710,205)	\$	594,920		\$	196	,800		Φ	204	,000		Φ	90,0	000		Ψ	204,000	,

TOWN OF BELMONT, MA ANNUAL BUDGET FY18 CAPITAL OUTLAY DETAIL

FUND: WATER ENTERPRISE

PROGRAM: DPW - WATER DIVISION

DESCRIPTION	NEED	PRIORITY	#	UNIT	TOTAL	LESS	DEPT	TOWN	WARRANT	ADOPTED
	BASIS	R/A	REQ.	COST	COST	TRADE IN	REQUEST	ADMIN	COMM	BDGT
Water Main Replacement	1	R	1	\$250,000	\$250,000	\$0	\$250,000			
Water Main Bond Repayment	2	R	1	\$718,621	\$718,621	\$0	\$718,621			
#80 Emergency Service Van	3	R	1	\$35,200	\$35,200	\$500	\$34,700			
Smart Meter Program - Phase II	4	R	1	\$1,100,000	\$1,100,000	\$0	\$1,100,000			
					\$0	\$0	\$0			
					\$0	\$0	\$0			
TOTALS					\$2,103,821	\$500	\$2,103,321			

PUBLIC WORKS DEPARTMENT - WATER ENTERPRISE SCHEDULE OF MAJOR CAPITAL EQUIPMENT REPLACEMENT COSTS - "PRESENT DAY"

	FY 2018	DIV		FY 2019	DIV		FY 2020	DIV	<u>F</u>	Y 2021	DIV	1	Y 2022	DIV	1	Y 2023	DIV
\$	Water Main Replacement (WE) 250,000	WTR	\$	Water Main Replacemen (WE) 250,000	L	\$	Water Mair Replaceme (WE) 250,000	į.	\$	Water Mair Replacement (WE) 250,000	1	\$	Water Mair Replaceme (WE) 250,000	ı	\$	Water Mair Replacement (WE) 250,000	1
\$	Water Main Bond Repaymen (WE) 718,621	t WTR		Water Main Bond Repaym (WE) 754,552		\$	Water Maii Bond Repayn (WE) 792,280		E \$	Water Mair Bond Repaym (WE) 831,894	i	£	Water Mai Bond Repayn (WE) 873,488		\$	Water Maii Bond Repaym (WE) 917,163	
\$	#80 - Emergency Service Van (WE) 35,200	WTR	Re	78 - 1-Ton Pic eplacement (WE) 45,300	k Up WTR	#	84 - 37,000 (Dump Truc (WE) 130,305			(WE)	WTR	Adr	ninistrative √ (WE) 40,850	/ehicle WTR	\$	(WE)	WTR
\$	Smart Meter Progra Phase II (WE) 1,100,000	am WTR		(WE)	WTR	\$	(WE)	WTR	\$	(WE)	WTR	\$	(WE)	WTR	\$	(WE)	WTR
	(WE)	WTR		(WE)	WTR	\$	(WE)	WTR	\$	(WE)	WTR	\$	(WE)	WTR	\$	(WE)	WTR
	(WE)	WTR	\$	(WE)	WTR	\$	(WE) -	WTR	\$	(WE)	WTR	\$	(WE) -	WTR	\$	(WE)	WTR
\$	WE)	WTR	\$	(WE)	WTR	\$	(WE) -	WTR	\$	(WE)	WTR	\$	(WE)	WTR	\$	(WE)	WTR
_\$ (\$	1,049,852		\$	1,172,585		\$	1,081,894		\$	1,164,338		\$	1,167,163	



TOWN OF BELMONT

460 CONCORD AVENUE P.O. BOX 130 BELMONT, MASSACHUSETTS 02478-0002

POLICE DEPARTMENT



To:

Ms. Anne Marie Mahoney, Chair

And Members of Capital Budget Committee

From:

Police Chief Richard J. McLaughlin

Date:

January 11, 2017

Subject:

Capital Budget Request for FY 2018

1. Project/Item - Replace Network Switches (Priority #1)

A. New Proposal - Yes

- B. Replacement of existing equipment Replacement of the network switches that form the backbone of our in-house network connecting all our computerized resources.
 - i. Existing component was purchased in 2011
 - ii. End life of hardware no reuse
- C. Additional enhancement for something existing No We are not adding any new features.
- 2. Reason for the Request Existing hardware is beyond the expected life span and is no longer eligible for maintenance or security updates.
- 3. Cost \$ 35,000
 - a. Written quotes. State bid pricing
 - b. Estimates and quotes from December 2016
 - c. Effect on future operating budgets
 - i. No change in staffing
 - ii. After initial warranty period on hardware there may be a change in annual maintenance agreements in the operating budget.
 - iii. Any needed training, if any, will be provided as part of the system upgrade.
 - iv. No additional licenses

- v. There will be a continuation of a maintenance agreement after warranty period for maintenance on the hardware.
- 4. Timing of Project
 - a. No additional work prior to upgrade.
 - b. No other approvals
 - c. 3 4 months from purchase order issue
 - d. No phasing
 - e. No bidding required, hardware will be purchased from the state contract.
- 5. Life Expectancy
 - a. Hardware life expectancy is 5-7 years and will need to be replaced / upgraded at that time.
- 6. Funding
 - a. Bonding No.
 - b. No grants available
 - c. Original purchase was in FY 2012 capital budget

- 1. Project/Item Replacement of Netclock System (Priority #2)
 - A. New Proposal Yes
 - B. Replacement of existing equipment Replacement of the NetClock time synchronization system
 - i. Existing component was purchased in 2004
 - ii. End of Life No reuse
 - C. Additional enhancement for something existing No
- 2. Reason for the Request The current NetClock, which synchronizes all times to GPS time for our computer network, radio system, and fire box receiving system is no longer supported by the manufacturer. It is critical for all our times to be the same for verifying responses and calls received during an incident.
- 3. Cost \$ 12,500
 - a. Written quote, State Contract
 - b. Estimates and from January 2017
 - c. Effect on future operating budgets
 - i. No change in staffing
 - ii. No Change
 - iii. Any needed training will be included in the hardware installation
 - iv. No additional licenses
 - v. No additional impact
- 4. Timing of Project
 - a. No additional work prior to upgrade.
 - b. No other approvals
 - c. 3 4 months from purchase order issue
 - d. No phasing
 - e. Purchase from State Contract
- 5. Life Expectancy
 - a. Estimated at 7 to 10 years
- 6. Funding
 - a. Bonding No
 - b. No grants available
 - c. Original purchase was in Fiscal 2005

5 Year Projectior	5	Υe	ar	Pi	oi	ec	tio	n
-------------------	---	----	----	----	----	----	-----	---

Capital Items Needed

							\$0
							\$C
Replace NetClock System	12,500						\$12,500 \$35,000
Replace Network Switches	35,000	20,000					\$20,000
Replacement of 2 Domain Controller Servers Replacement of CAD/RMS Server		20,000	30,000				\$24,000
Replace Telephone and Radio Logging Recorder				16,500	00.000		\$16,500 \$20,000
Replace LiveScan Fingerprint System					20,000	45,000	\$45,000
Replace Police Radio Repeaters							\$(
							\$(
							\$(
							\$0
The state of the s	¢47 E00	\$20,000	\$30,000	\$16,500	\$20,000	\$45,000	\$173,00
Total Capital Items No	eded \$47,500	\$20,000	430,000	Ψ10,000		[F., Y. F. F. J. S. S. S.	Transministration (Assume

Capital items through Grants or Donations						[
New Traffic Speed Trailer	16,000					\$16,000
Incident Command Vehicle for Major Incidents & Events (Equipm	20,000		200 1200 1000	Douglaster of Path, pro- and 45 No.	JANES STANDARD BAGAN	\$20,000 \$36,000
Total Through Grants and Donations	\$36,000	\$0				500,000

^{***} If any money is received from Grants the money is reduced from above.

F 2018

Replace Network Switches \$35,000

This request is to replace the network switches that connect all the computer equipment in the Police Station

the were last replaced in Fiscal 2012

Replace Net Clock System \$12,500

The request is to replace the network time synchronization unit, it was purchased in Fiscal 2005 and is used to synchronize the times on the network, radio console, CAD system and fire box receiving system.

FY 2019

Replacement of Police Domain Controller Servers \$20,000.

This request is to replace the 2 Police network domain controller servers. The current servers were purchased in 2013 and will no longer eligible for a maintance agreement.

FY2020

Replacement of CAD/RMS Server \$30,000.

This request is to replace our Computer Aided Dispatch and Records Management Server, it was last replaced in Fiscal 2015

FY2021

Replacement of Telephone and Radio Logging Recorder \$16,500.

This replacement is for the radio and telephone audio archiving recorder. The current recorder was replaced in Fiscal 2013

FY2022

Replacement of LiveScan Fingerprint System \$20,000

This replacement is for the LiveScan Fingerprinting System. The current LiveScan System was replaced in Fiscal 2015

FY2023

Replacement of Police Radio Repeaters \$45,000

This replacement is for the Police Radio Repeaters. The current repeaters were replaced in Fiscal 2014

Section III Page 39

Capital Requests FY2018 FY2019 FY2020 FY2021 FY2022 Election Systems Upgrade \$ 75,000 \$ - \$ 75,000 \$ - \$ - 0

SUBMISSION FOR FY2018

Election systems, also known as optical scan voting machines, for Belmont's eight voting precincts must be certified by the Secretary of the Commonwealth before deployment. Two systems have received that certification. Belmont Town Clerk original submission included capital request for FY2018, however an additional vote tabulation system is approaching State certification that has received very positive reviews from Town Clerks and voters. To give us the broadest possible choice, I have delayed our request to FY19. In 2016, Belmont had to purchase an additional voting machine to tabulate the Early Voting ballots, bringing our new total to ten machines. This was necessitated by the Election Reform Law of 2014 that became effective for November 2016 - Early Voting, by Law, must be available for every biennial State Election. The timing of this request is to dovetail with the upcoming elections to allow purchase and deployment with training. at an election prior to the 2020 elections.

Belmont's current ten voting machines, Accu-vote systems, were purchased in 1998 for \$79,760 and have a remaining useful life of up to five years. Replacement costs for each Accu-vote with one of the two newly certified election systems, is approximately \$7000 per machine. One machine per precinct and the spare/consolidation machine and Early Voting machine, totaling ten, plus ballot boxes, software integration with our GEMS elections reporting system, education and support.

Replacement of the current equipment must occur before the accuracy and integrity of the current system fails. Replacement Costs per vendor of certified systems.

The plan to deploy the new machines, if approved, is timed the fall/spring of FY2019, in anticipation of the Town & State Election cycle preceding the 2020 Presidential cycle to ensure familiarity, accurate performance and positive results.

Frequency of replacement: approximately every 20 years.

BELMONT TOWN CLERK - FIVE YEAR PLAN

Requestor: Ellen O'Brien Cushman, Town Clerk

1. INFORMATION TECHNOLOGY CBC REQUEST FOR FY 2018

1. WHAT IS THE PROJECT/ITEM – <u>Fiber Network Assessment</u>, <u>Mapping and Testing</u>

This is a new proposal.

2. REASON FOR THE REQUEST

This request is related to the disposition of the Old Light Building at 450 Concord Avenue and the completion of the new Power Substation at Flanders Road.

The building at 450 Concord Avenue houses one of the two main hubs for the Town Fiber Network and Power Substation #1. Decommissioning of Substation #1 will begin shortly after the new Flanders Road Substation is completed later in FY2017.

<u>Without the Fiber Hub</u> at 450 Concord Avenue the following Town, School and Public Safety Systems <u>will not function</u>:

- a. Computer.
- b. Phone.
- c. Security.
- d. Radio.

Any sale or reconstruction of this building will require moving the fiber hub. This process is a multi-year project and needs to start no less than 3 years before sale or reconstruction of the building.

This is the first of a three phase project.

The combined Phases of the project (est. \$330k) will provide the Town with:

- 1. GIS map with the detailed location of all fiber throughout the Town.
- 2. The relocation of the fiber hub at 450 Concord Avenue.
- 3. Plan for future fiber needs/construction.
- 4. Plan for relocation of fiber hub at the Library and High School.

3. COST - \$60,000.00

- a. How was cost arrived at? Based on verbal quotes from state contract vendors.
- b. How recent is the estimate 90 days
- c. What effect will this have on future operating budgets None
 - i. Will there be an increase/decrease in staffing as a result of this No increase or decrease in staff.
 - ii. Will operating costs increase/decrease Will reduce costs in future fiber projects by reducing time in design and construction because of having full and accurate documentation. Will reduce future road project delays caused by repairing fiber which was excavated because no drawings were available.

- iii. Is there a need for training due to the purchase of this item No training required.
- iv. Is there a need for the purchase of licenses to use the equipment **No licenses needed.**
- v. Are there ongoing maintenance contracts required for this item Ongoing maintenance requires updating in GIS which is already part on operating budget.

4. TIMING OF PROJECT

- a. What else might need to be done in order to implement the project for the coming fiscal year **Nothing known at this time.**
- b. Do you need approvals from any other group (Planning Board, Historic District Commission, Conservation Commission etc) Will need to coordinate with DPW for road barriers, Light dept. for access to electric manholes and light poles, Verizon for access to their manholes and poles. Polices details also needed.
- c. How long will it take to complete the project Approx. 6 months.
- d. Can the project be phased This is the first Phase of a three phase project. This phase must be completed before any addition work is feasible.
- e. Does the project need to be bid-No need to bid. Project will be with Town vendors currently on State Contract.
- 5. LIFE EXPECTANCY OF THIS ITEM/PROJECT Indefinite. The physical components consist of electronic documentation.

- a. Can this be legally bonded Not known, but probably not.
- b. Are there any grants or reimbursements available for this purchase **None known.**

2. Information Technology CBC Request for FY2018

1. WHAT IS THE PROJECT/ITEM — Upgrade main Town Network Hubs to 10GB speed.

This is a new proposal.

- a. Replacement for something already existing Yes.
 - i. If a replacement, year existing item was purchased 2010, 2011
 - ii. If a replacement, plan for existing item Switchgear purchased in 2011 will be shelved for spares. Switchgear purchased in 2010 is end of life and will be scrapped.
- b. Additional enhancement for something existing Yes current speed is
- 2. REASON FOR THE REQUEST

The Network equipment at the Light Dept. feeds Highway, Water, Senior Center, Butler School, and Fire Headquarters.

The equipment is end of life. The speed of the network at those locations is degrading causing delayed access to email, files and cloud based programs. The Fire Department is consolidating several applications and moving them to a cloud based system. The current speed of the network will not provide proper access to the new cloud application.

- 3. COST \$30,000.00
 - a. How was cost arrived at Quote (attached) received from vendor on state contract.
 - b. How recent is the estimate -2 days.
 - c. What effect will this have on future operating budgets Maintenance contract will change. This has already been accounted for in the operating budget.
 - i. Will there be an increase/decrease in staffing as a result of this No increase or decrease in staff.
 - ii. Will operating costs increase/decrease Maintenance contract cost will increase approx. \$1000.00, however this is accounted for in operating budget.
 - iii. Is there a need for training due to the purchase of this item No training needed.
 - iv. Is there a need for the purchase of licenses to use the equipment **No licenses needed.**
 - v. Are there ongoing maintenance contracts required for this item Yes If so, has that been included in your operating budget Yes
- 4. TIMING OF PROJECT
 - a. What else might need to be done in order to implement the project for the coming fiscal year **Nothing known**.
 - b. Do you need approvals from any other group (Planning Board, Historic District Commission, Conservation Commission etc) No
 - c. How long will it take to complete the project Approx. 30 days from project plan completion and receipt of equipment.

- d. Can the project be phased No
- e. Does the project need to be bid No bidding required. Vendor is on state contract.
- 5. LIFE EXPECTANCY OF THIS ITEM/PROJECT 5 7 years.
 - a. Is this a one time purchase, or will it need to be replaced in the future –
 Equipment will need to be replaced. This will be done through operating budget.
- 6. FUNDING
 - a. Can this be legally bonded No
 - b. Are there any grants or reimbursements available for this purchase No
 - c. If this is a replacement, how was the existing item funded **Operating** budget.

LCN networks (\$\frac{1}{20} \rightarrow \frac{\text{Voice Data Video}}{250 \text{Libbey Parkway, Weymouth, MA 02188} P: 781.340.1400}

Alcatel-Lucent

Massachusetts State Contract Vendor ITT50 - ITS43-ITC54

ITT50 VC 6000156277 - ITS43 VC 6000156277 - ITC54 VC 60001562775 USAC SPIN Number 143046502

Price quotation prepared for:

Town of Belmont 10gb Upgrade Project

Contact:

Phil Sullivan

Date: 10-Jan-17 Buyer Reference: MDL Prepared by: Michael D Lieb

All Pricing is in U.S. Dollar

ection 1 - Hardware and So	Description	List Price	Cat	Qty	Your Cost	Extension
CCHOILT MING WATE IN A PO					Т	
9S6900-X20-F	Statement of Work - Project Implementation BILD IRU 10GE L3 fixed chassis with 20 SFP+ ports, one optional module slot. Front to Rear cooling, Includes a 450W AC power supply and country specific cord. Ships with user manuals access card, rack mounts, and USE to RJ 45 adaptor.	\$15,000.00	G	1	\$8,250.00	\$8,25
0S6900-SW-AR	OS6900-SW-AR Advanced routing software license. Includes support for Policy Based	\$2,000.00	G	1	\$1,100.00	\$1,10
FP-10G-LR	10 Gigabit optical transcriver SFP+). Supports monomode fiber over 1310nm wavelength nominal) with an LC connector. Typical reach of 10Km Transell Fire	\$1,900.00	M	4	\$665.00	\$2,66
DS6860-P48	OSS860-P48 Gigabit Ethernet L3 1RU chassis. 48 RJ45 10/100/1000 BaseT P0E+ ports, 4x10G SFP+, 2x20G stacking ports. Includes: 920W AC P0E power supply, country specific power. cord, user manuals access card, micro-USB to USB console adaptor.	\$ 9,095.00	G	1	\$5,002.25	\$5,00
DS6860-48	OS6860-48 Gigabit Ethernet L3 1RU chassis. 48 RJ45 10/100/1000 BaseT ports, 4x10G SFP+ ports, 2x20G stacking ports. Includes: AC power supply, country specific power cord, user manuals access card, micro-USB to USB console adaptor.	\$7,695.00	G	1	\$4,232.25	\$4,2
DS6860-SW-AR	OS6860-SW-AR Advanced routing software license. Includes support for VRF, IPv4 routing protocols BGP, OSPFv2, PIMSM/DM, DVMRP. Includes IPv6 Routing, RIPng, OSPFv3, as well as SPB-M	\$100.00	G	1	\$55.00	\$
DS6860-CBL-100	OS6860 20 Gigabit direct attached stacking copper cable 1m, QSFP+)	\$450.00	G	1	\$247.50	\$2-
SFP-10G-LR	10 Gigabit optical transceiver SFP+). Supports monomode fiber over 1310nm wavelength nominal) with an LC connector. Typical reach of 10Km	\$1,900.00	М	2	\$665.00	\$1,3
SFP-10G-LR	Homer - Library - Chenery 10 Gig Gbies 10 Gigabit optical transceiver SFP+). Supports monomode fiber over 1310nm wavelength	\$1,900.00	м	3	\$665.00	\$1,9
AUG-AM	nominal) with an LC connector. Typical reach of 10Km					
			L	SEC	TION 1 SUBTOTAL:	\$24,8
Section 2 - Professional Inst	allation Services for Hardware and Software listed above;					
Section 2 - Professional Inst	allation Services for Hardware and Software listed above: Statement of Work LCN-Pro Services LCN On-site Professional Services to Configure, Install and test Core Fiber switch and optical connections to remote sites. Documentation and Udate of Network As-Builts.	\$1,400.00	A	2	\$1,400.00	\$2,8
LCN Pro	Statement of Work LCN-Pro Services LCN On-site Professional Services to Configure, Install and test Core Fiber switch and optical	\$1,400.00		2 8	\$1,400.00 \$125.00	
10 - 8000, 2845-158-30 (15 Sec.) (20	Statement of Work LCN-Pro Services LCN On-site Professional Services to Configure, Install and test Core Fiber switch and optical connections to remote sites. Documentation and Udate of Network As-Builts.	1-7	A	8	\$125.00 \$25.00	51,6
LCN Pro LCN inf LCN - Assett Mgt	Statement of Work LCN-Pro Services LCN On-sile Professional Services to Configure, Install and test Core Fiber switch and optical connections to remote sites. Documentation and Udate of Network As-Builts. On-Site Siwthc Installs w/ Patch Out	\$125.00	A	8	\$125.00	\$1,0
LCN Pro LCN inf LCN - Assett Mgt	Statement of Work LCN-Pro Services LCN On-sile Professional Services to Configure, Install and test Core Fiber switch and optical connections to remote sites. Documentation and Udate of Network As-Builts. On-Site Siwthe Installs w/ Patch Out Network Equipment - Asset Tagging - Inventory Dhase Management ware - Management and Support Entitlements TYR SUPPORT Software for all OS6860 Basic and Enhanced models. Includes 24x7 Remote Telephone Support, 24x7 Remote Problem Diagnosis, access to Software Updates and	\$125.00	A	8	\$125.00 \$25.00	\$1,0 \$3,8
LCN Pro LCN inf LCN - Assett Mgt Section 3 - Hardware - Soft SWIN-OS6860	Statement of Work LCN-Pro Services LCN On-site Professional Services to Configure, Install and test Core Fiber switch and optical connections to remote sites. Documentaiton and Udate of Network As-Builts. On-Site Siwthe Installs w/ Patch Out Network Equipment - Asset Tagging - Inventory Dhase Management ware - Management and Support Entitlements 11YR SUPPORT Software for all OS6860 Basic and Enhanced models. Includes 24x7 Remote	\$125.00 \$25.00 \$150.00	A A	8 1 SEC	\$125.00 \$25.00 TION 2 SUBTOTAL:	\$3,4
LCN Pro LCN inf LCN - Assett Mgt Section 5 - Hardware - Soft SW1N-OS6860 SW1N-OS6860SWAR	Statement of Work LCN-Pro Services LCN On-sile Professional Services to Configure, Install and test Core Fiber switch and optical connections to remote sites. Documentaiton and Udate of Network As-Builts. On-Site Siwthe Installs w/ Patch Out Network Equipment - Asset Tagging - Inventory Dhase Management ware - Management and Support Entitlements 1YR SUPPORT Software for all OS6850 Basic and Enhanced models, Includes 24x7 Remote Telephone Support, 24x7 Remote Problem Diagnosis, access to Software Updates and Upgrades, and access to support portal. 1YR SUPPORT Software for OS6860-SW-AR. Includes 24x7 Remote Telephone Support, 24x7 Remote Problem Diagnosis, access to Software Updates and Upgrades, and access to support portal.	\$125.00 \$25.00 \$150.00	A A D Z Z	8 SEC	\$125.00 \$25.00 TION 2 SUBTOTAL:	\$3,4
LCN Pro LCN inf LCN - Assett Mgt Section 3 - Hardware - Soft	Statement of Work LCN-Pro Services LCN On-site Professional Services to Configure, Install and test Core Fiber switch and optical connections to remote sites. Documentaiton and Udate of Network As-Builts. On-Site Siwthe Installs w/ Patch Out Network Equipment - Asset Tagging - Inventory Dhase Management ware - Management and Support Entitlements "YR SUPPORT Software for all OS6860 Basic and Enhanced models. Includes 24x7 Remote Telephone Support, 24x7 Remote Problem Diagnosis, access to Software Updates and Upgrades, and access to support portal. 1YR SUPPORT Software for OS6800-SW-AR. Includes 24x7 Remote Telephone Support, 24xRemote Problem Diagnosis, access to Software Updates and Upgrades, and access to support portal. 1YR SUPPORT Software for OS6800-SW-AR. Includes 24x7 Remote Telephone Support, 24x. Remote Problem Diagnosis, access to Software Updates and Upgrades, and access to support portal. 1YR SUPPORT Software for OS6900-SW-AR. Includes 24x7 Remote Telephone Support, 24x. Remote Problem Diagnosis, access to Software Updates and Upgrades, and access to support	\$125.00 \$25.00 \$150.00	A A D Z Z D Z Z	1 SEC	\$125.00 \$25.00 ETION 2 SUBTOTAL: \$135.00 \$45.00	\$
LCN Pro LCN inf LCN - Assett Mgt Section 5 - Hardware - Soft SW1N-OS6860 SW1N-OS6860SWAR SW1N-OS690OSWAR	Statement of Work LCN-Pro Services LCN On-site Professional Services to Configure, Install and test Core Fiber switch and optical connections to remote sites. Documentaiton and Udate of Network As-Builts. On-Site Siwthe Installs w/ Patch Out Network Equipment - Asset Tagging - Inventory Dhase Management ware -Management and Support Entitlements 1YR SUPPORT Software for all OS6800 Basic and Enhanced models. Includes 24x7 Remote Telephone Support, 24x7 Remote Problem Diagnosis, access to Software Updates and Upgrandes, and access to support portal. 1YR SUPPORT Software for OS6800-SW-AR. Includes 24x7 Remote Telephone Support, 24x7 Remote Problem Diagnosis, access to Software Updates and Upgrandes, and access to support portal. 1YR SUPPORT Software for OS6900-SW-AR. Includes 24x7 Remote Telephone Support portal. 1YR SUPPORT Software for OS6900-SW-AR. Includes 24x7 Remote Telephone Support portal. 1YR SUPPORT Plus for all OS6900 Chassis models. Includes 24x7 Remote Support Joingnosis, access to SW Updates / support portal, and next business day advance HW replacement. Chassis, PSU, modules and fautray are included. Availability per country.	\$125.00 \$25.00 \$150.00 \$50.00	A	1 SEC 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	\$125.00 \$25.00 ETION 2 SUBTOTAL: \$135.00 \$45.00	\$1,0 \$3,4 \$5,0 \$1,0 \$1,0

Town of Belmont

Information Technology Homer Municipal Building Tel.: 617-993-2750



19 Moore Street Belmont, Massachusetts 02478

January 12, 2017

TO: Capital Budget Committee

FROM: David Petto, IT Director Town of Belmont

RE: Information Technology Capital Budget 5 Year Projection

The following Departments are submitting CB Technology Requests for FY2018:

• Facilities: Phase IV related to the upgrade of the Town Security System.

I have reviewed the above request and fully support it.

The Town Information Technology Department five year Capital Budget Projection is outlined below:

Fiscal Year	FY2	019	FY2020	FY2021	FY2022	FY2023
	1. Fiber	2.				
	Network	Additional				
	Engineering	Data	Network			Additional
	& Design	Storage	Construction			Data Storage
Item	Services.	Network	Services.	None	None	Network
		Capacity				
		Increase				
		for				Capacity
	Phase II	Electronic				Increase for
	Fiber Hub	File	Phase III Fiber			Electronic File
Description	Move.	Storage.	Hub Move.	None	None	Storage.
Estimated						
Cost	\$50,000.00	\$90,000.00	\$200,000.00	None	None	\$90,000.00
Total	\$140,0	00.00	\$200,000.00	\$0.00	\$0.00	\$90,000.00

Town of Belmont

Information Technology Homer Municipal Building Tel.: 617-993-2750



19 Moore Street Belmont, Massachusetts 02478

FY2019

- 1. This Phase II of Three in the mapping, designing and construction of the Town-Wide Fiber Network. Included in this phase is the design and plan for:
 - a) Relocating the Fiber hub from the 450 Concord Ave. building.
 - b) Relocating hub at the Library.
 - c) Relocating hub at the High School.
 - d) Any addition fiber needed to relieve 'choke' points on the network.
- 2. Additional data storage is anticipated based on current growth and the implementation of a Document Storage System.
- FY2020 This would be Phase III of the Fiber Project. This would be the actual moving of the fiber hub at 450 Concord ave.
- FY2021 No Capital Budget request is anticipated this year.
- FY2022 No Capital Budget request is anticipated this year.
- FY2023 Additional data storage is anticipated based on current File System growth.

CBC REQUEST TEMPLATE INSTRUCTIONS FOR FY 2018

1. WHAT IS THE PROJECT/ITEM - Quiet Study Rooms

- a. New proposal Yes, build out quiet study rooms.
- b. Replacement for something already existing No
 - i. If a replacement, year existing item was purchased.
 - If a replacement, plan for existing item (auction, discard, reuse by other person in department, reuse by other department)
- c. Additional enhancement for something existing Yes

2. REASON FOR THE REQUEST

This remains a pivotal piece of most public library programs that we do not provide and continue to be asked for. Patrons are able to drive just a few minutes to Arlington, Watertown, or Waltham and enjoy quiet study rooms in our neighboring town's public libraries. This will help increase the success of our offering to the public greatly, and likely will cause increase in our performance measures.

3. COST - \$50,000.00

- a. How was cost arrived at? (State Bid list, actual bid, professional cost estimate, based on experience, wild guess) Facilities Director Estimated Cost
- b. How recent is the estimate? (if older than a couple of years, you will be asked to refine or confirm it as current and that process could jeopardize the potential for getting on the list) ${f 1}$ year old, inflated for likely cost increase.
- c. What effect will this have on future operating budgets?
 - i. Will there be an increase/decrease in staffing as a result of this? No.
 - ii. Will operating costs increase/decrease? Please be specific. None.
 - iii. Is there a need for training due to the purchase of this item? No. If so, have you included that in your operating budget? N/A
 - iv. Is there a need for the purchase of licenses to use the equipment? If so, has that been included in your operating budget? No
 - v. Are there ongoing maintenance contracts required for this item? If so, has that been included in your operating budget? No.

4. TIMING OF PROJECT

- a. What else might need to be done in order to implement the project for the coming fiscal year? N/A
- b. Do you need approvals from any other group (Planning Board, Historic District Commission, Conservation Commission etc.). No.
 - If yes, when do you plan to do that?
 - ii. How long will it take to complete the project?
- c. Can the project be phased? Size of project is small, does not need phasing.
 - i. If so, please address the advantages and disadvantages

- ii. If this is an ongoing phased project, please include in the title the year we are in (for example, with Kal Wal at BHS, "year 4 of a 5 year plan" or whatever is appropriate).
- d. Does the project need to be bid? No.
 - i. If so, have the bid specs been written? When do you plan to bid this?

a. Is this a one time purchase, or will it need to be replaced in the future? One time project

6. FUNDING - \$50,000.00

- a. Can this be legally bonded? No.
- b. Are there any grants or reimbursements available for this purchase? No.
- c. If this is a replacement, how was the existing item funded (CBC, grant, donation, operating funds, other?) **N/A**

CBC REQUEST TEMPLATE INSTRUCTIONS FOR FY 2018

- 1. WHAT IS THE PROJECT/ITEM Phase 1 of lighting retrofits \$50,000
 - a. New proposal
 - b. Replacement for something already existing Yes.
 - i. If a replacement, year existing item was purchased. Est. 2000
 - ii. If a replacement, plan for existing item (auction, discard, reuse by other person in department, reuse by other department) **Discard**.
 - c. Additional enhancement for something existing Yes.

2. REASON FOR THE REQUEST

The lighting in place current is very outdated, not energy efficient, or cost effective. Current lighting does not provide a safe amount of light in most areas (stair wells, restrooms, hallways etc.).

3. COST

- a. How was cost arrived at? (State Bid list, actual bid, professional cost estimate, based on experience, wild guess) Facilities Director Estimate
- b. How recent is the estimate? (if older than a couple of years, you will be asked to refine or confirm it as current and that process could jeopardize the potential for getting on the list)

 Current.
- c. What effect will this have on future operating budgets?
 - i. Will there be an increase/decrease in staffing as a result of this? No.
 - ii. Will operating costs increase/decrease? Please be specific. Yes, energy costs will decrease by 2-3% per phase
 - iii. Is there a need for training due to the purchase of this item? If so, have you included that in your operating budget? **No.**
 - iv. Is there a need for the purchase of licenses to use the equipment? If so, has that been included in your operating budget? **No.**
 - v. Are there ongoing maintenance contracts required for this item? If so, has that been included in your operating budget? **No.**

4. TIMING OF PROJECT

- a. What else might need to be done in order to implement the project for the coming fiscal year? Coordination with Library staff to work around scheduling impact on regular operations
- b. Do you need approvals from any other group (Planning Board, Historic District Commission, Conservation Commission etc.). **No.**
 - i. If yes, when do you plan to do that?
 - ii. How long will it take to complete the project?
- c. Can the project be phased? Yes, that is what is proposed.
 - i. If so, please address the advantages and disadvantages

- ii. If this is an ongoing phased project, please include in the title the year we are in (for example, with Kal Wal at BHS, "year 4 of a 5 year plan" or whatever is appropriate). Year 1 of 2 year plan
- d. Does the project need to be bid? Yes.
 - i. If so, have the bid specs been written? When do you plan to bid this? **On or about July 1** when appropriation is available.

a. Is this a one time purchase, or will it need to be replaced in the future? **Modern fixtures** should last 10-15 years, then will require replacement.

- a. Can this be legally bonded? No.
- b. Are there any grants or reimbursements available for this purchase? Future phases may be considered for Green Communities grants.
- c. If this is a replacement, how was the existing item funded (CBC, grant, donation, operating funds, other?) **Operating Funds.**

CBC REQUEST TEMPLATE INSTRUCTIONS FOR FY 2018

- 1. WHAT IS THE PROJECT/ITEM Crack, Fill, Seal, Stripe Library Parking Lot
 - a. New proposal Yes.
 - b. Replacement for something already existing No.
 - If a replacement, year existing item was purchased.
 - ii. If a replacement, plan for existing item (auction, discard, reuse by other person in department, reuse by other department)
 - c. Additional enhancement for something existing Yes.

2. REASON FOR THE REQUEST

The Parking lot has many deficiencies and the curbing in many spots has been reduced to rubble which damages cars and the Library Memorial Garden regularly. Restriping might create additional spaces for citizens as well.

3. COST - \$20,000

- a. How was cost arrived at? (State Bid list, actual bid, professional cost estimate, based on experience, wild guess) Facilities Director Estimate
- b. How recent is the estimate? (if older than a couple of years, you will be asked to refine or confirm it as current and that process could jeopardize the potential for getting on the list) Current.
- c. What effect will this have on future operating budgets?
 - i. Will there be an increase/decrease in staffing as a result of this? No.
 - ii. Will operating costs increase/decrease? Please be specific. No.
 - iii. Is there a need for training due to the purchase of this item? No. If so, have you included that in your operating budget?
 - iv. Is there a need for the purchase of licenses to use the equipment? No. If so, has that been included in your operating budget?
 - v. Are there ongoing maintenance contracts required for this item? No. If so, has that been included in your operating budget?

4. TIMING OF PROJECT

- a. What else might need to be done in order to implement the project for the coming fiscal year? Coordination with Library Administration as the parking lot will be unavailable to staff and patrons for certain periods of time.
- b. Do you need approvals from any other group (Planning Board, Historic District Commission, Conservation Commission etc.). No.
 - If yes, when do you plan to do that?
 - How long will it take to complete the project?
- c. Can the project be phased? No, phasing would be inefficient given the continuous nature of the surface area in question.

- i. If so, please address the advantages and disadvantages
- ii. If this is an ongoing phased project, please include in the title the year we are in (for example, with Kal Wal at BHS, "year 4 of a 5 year plan" or whatever is appropriate).
- d. Does the project need to be bid?
 - i. If so, have the bid specs been written? When do you plan to bid this? Yes, per Chapter 30, 39M. Specifications development can begin July 1 with procurement two months later.

a. Is this a one time purchase, or will it need to be replaced in the future? It will need to be done again eventually.

- a. Can this be legally bonded? No.
- b. Are there any grants or reimbursements available for this purchase? No.
- c. If this is a replacement, how was the existing item funded (CBC, grant, donation, operating funds, other?) N/A

CBC REQUEST TEMPLATE INSTRUCTIONS FOR FY 2018

1. WHAT IS THE PROJECT/ITEM - Gutters

- a. New proposal
- b. Replacement for something already existing Yes.
 - i. If a replacement, year existing item was purchased.
 - ii. If a replacement, plan for existing item (auction, discard, reuse by other person in department, reuse by other department) Demolish
- c. Additional enhancement for something existing

2. REASON FOR THE REQUEST

The gutters have holes in them and cause issues with ice (above and on the ground) during the winter.

3. COST - \$35,000, including design

- a. How was cost arrived at? (State Bid list, actual bid, professional cost estimate, based on experience, wild guess) Facilities Director Estimate from consultant
- b. How recent is the estimate? (if older than a couple of years, you will be asked to refine or confirm it as current and that process could jeopardize the potential for getting on the list) **January 2017.**
- c. What effect will this have on future operating budgets?
 - i. Will there be an increase/decrease in staffing as a result of this? No.
 - ii. Will operating costs increase/decrease? Please be specific. Less rock salt will be needed during the winter, and staff time spent addressing it.
 - iii. Is there a need for training due to the purchase of this item? If so, have you included that in your operating budget? **No.**
 - iv. Is there a need for the purchase of licenses to use the equipment? If so, has that been included in your operating budget? **No**.
 - v. Are there ongoing maintenance contracts required for this item? If so, has that been included in your operating budget? **No.**

4. TIMING OF PROJECT

- a. What else might need to be done in order to implement the project for the coming fiscal year? **N/A** as gutters cannot be repaired in part.
- b. Do you need approvals from any other group (Planning Board, Historic District Commission, Conservation Commission etc.). **No.**
 - i. If yes, when do you plan to do that?
 - ii. How long will it take to complete the project?
- c. Can the project be phased? Could be split into two phases, doing one side at a time.
 - If so, please address the advantages and disadvantages? The only advantage would be to spread out the cots. The disadvantage is that s deteriorating condition would continue on one side for a year later.

- ii. If this is an ongoing phased project, please include in the title the year we are in (for example, with Kal Wal at BHS, "year 4 of a 5 year plan" or whatever is appropriate).
- d. Does the project need to be bid?
 - i. If so, have the bid specs been written? When do you plan to bid this? Yes, specificaion development could begin on July 1, with bids being procured tow months later.

a. Is this a one time purchase, or will it need to be replaced in the future? It will need to be replaced in the future.

- a. Can this be legally bonded? No.
- b. Are there any grants or reimbursements available for this purchase? No.
- c. If this is a replacement, how was the existing item funded (CBC, grant, donation, operating funds, other?) **Unknown, presumably from CBC budget as prior project.**

A. THE BASIC PROJECT

- 1. What is the project? Fire Staff Vehicle 1
- 2. Where would it be located? (see location G below) Fire Headquarters
- 3. What is the estimated cost? \$57,200
 - a. How recent is the currently available estimate? December 2016
 - b. How was the currently available estimate derived? Current Bids

& Dealer's assistance

B. PERSONS INVOLVED

- 1. Who is the sponsor of the project? Fire Department
- 2. Who, specifically, would supervise the project? Chief Frizzell
- 3. Who would use the completed project? Fire Department
 - a. By class or group.
 - b. Estimated numbers (how estimated.)
- 4. Who has to agree to authorize the project (see funding and location, dealt with a G and G below.) Town Administrator, Selectmen, Warrant Committee, Capital Budget Committee, Town Meeting.
- 5. Who, as a practical matter, has to cooperate to get the project completed? See above

C. TIMING, DELAY AND DENIAL

- 1. Is this project ready to be implemented now? Ready for implementation for arrival in late 2017 or early 2018
- 2. If not, what remains to be done before the project is undertaken? **Specifications**, bidding, and outfitting.
- 3. When does the sponsor propose that the project be undertaken, and why? Project will replace a 11 year old vehicle and 11 year old vehicle will become the
- 4. How long will it take to complete the project and what are the important milestones along the way? It will take 4-6 months to complete the project
- 5. What are the consequences of delay? Denial? (see alternatives below.) If project is delayed it will increase the operational and maintenance costs and will continue to run handicapped as we do not have a spare vehicle.
- 6. With what other project or projects should this project be coordinated? None
 - a. Why?
 - b. How; precede, simultaneous, succeed?
- 7. What is the life of the project? 10 years total.
- 8. Can the project be phased or broken into subprojects? No
 - a. How? (or why not?) Only a single vehicle which must be purchased at a single time.
 - b. What are the advantages and disadvantages of phasing?
 - c. Each subproject or phase should be analyzed as if it were a project itself; in other words, what are the answers to each question in this template regarding each possible subproject?

D. OPERATING BUDGET

- 1. What are the implications of this project for the current Operating Budget?

 Increased repair and operating expenses. Long term impact on increased operating and repair expenses.
- 2. Who will be responsible for this project once it is completed? Fire Department
- 3. Will this project result in an increase? or decrease? In personnel. No change
- 4. What maintenance will this project require when it is completed? an increase? or decrease over the present. No significant change in overall Department maintenance costs

E. ALTERNATIVES

- 1. How is the Town getting the function or functions of this project accomplished now? Town supplies emergency response vehicles.
- 2. What are the problems with the current method of accomplishing those functions?

 No issues other than age and dependability of the vehicle.
- 3. How was the project proposal determined? Age of vehicle in emergency response.
- 4. What alternatives have not yet been considered? No known alternatives for vehicles equipped to provide emergency response.

- 1. What source or sources of funding does the sponsor propose, and why? Capital Budget. Historically funded from Capital Budget.
- 2. Can this project be legally bonded? unknown
 - a. If not the whole, what parts?
 - b. For what term?
- 3. Are there revenue sources within this project? No
 - a. What are they?
 - b. How much might they yield on an annual basis?
- 4. What would be involved in implementing them? Are grants or reimbursements available for any part(s) of this project? No
 - a. What are they?
 - b. How much might be realized from them?
 - c. Who must consent or make the grant?
 - d. What is the time schedule imposed by the grant or reimbursement process? How does that time schedule fit with (what would otherwise be) the construction schedule?
 - e. What other requirements are imposed by the grant or reimbursement process?

G. LOCATION

- 1. Has the proposed location for the project been chosen? Yes, Fire Department
- 2. Is the proposed location currently available and in the control of the Town authority or committee who is proposing the project? **Yes**
- 3. If not, from whom must the location be acquired or by whom must its use be authorized?
- 4. What is the process for making the location available? How recent is that estimate and how was it derived?
- 5. What issues, besides control and price, if any, does the proposed location present?

NOTE: These questions (and others) may be more for the Committee and Town Officials than for the project sponsors.

A. THE BASIC PROJECT

- 1. What is the project? Fire Staff Vehicle 2
- 2. Where would it be located? (see location G below) Fire Headquarters
- 3. What is the estimated cost? \$57,200
 - a. How recent is the currently available estimate? December 2016
 - b. How was the currently available estimate derived? Current Bids

& Dealer's assistance

B. PERSONS INVOLVED

- 1. Who is the sponsor of the project? Fire Department
- 2. Who, specifically, would supervise the project? Chief Frizzell
- 3. Who would use the completed project? Fire Department
 - a. By class or group.
 - b. Estimated numbers (how estimated.)
- 4. Who has to agree to authorize the project (see funding and location, dealt with a G and G below.) Town Administrator, Selectmen, Warrant Committee, Capital Budget Committee, Town Meeting.
- 5. Who, as a practical matter, has to cooperate to get the project completed? See above

C. TIMING, DELAY AND DENIAL

- 1. Is this project ready to be implemented now? Ready for implementation for arrival in late 2017 or early 2018
- 2. If not, what remains to be done before the project is undertaken? **Specifications**, bidding, and outfitting.
- 3. When does the sponsor propose that the project be undertaken, and why? Project will replace a 11 year old vehicle.
- 4. How long will it take to complete the project and what are the important milestones along the way? It will take 4-6 months to complete the project
- 5. What are the consequences of delay? Denial? (see alternatives below.) If project is delayed it will increase the operational and maintenance costs and will continue to run handicapped as we do not have a spare vehicle.
- 6. With what other project or projects should this project be coordinated? None
 - a. Why?
 - b. How; precede, simultaneous, succeed?
- 7. What is the life of the project? 10 years total.
- 8. Can the project be phased or broken into subprojects? No
 - a. How? (or why not?) Only a single vehicle which must be purchased at a single time.
 - b. What are the advantages and disadvantages of phasing?
 - c. Each subproject or phase should be analyzed as if it were a project itself; in other words, what are the answers to each question in this template regarding each possible subproject?

D. OPERATING BUDGET

- 1. What are the implications of this project for the current Operating Budget?

 Increased repair and operating expenses. Long term impact on increased operating and repair expenses.
- 2. Who will be responsible for this project once it is completed? Fire Department
- 3. Will this project result in an increase? or decrease? In personnel. No change
- 4. What maintenance will this project require when it is completed? an increase? or decrease over the present. No significant change in overall Department maintenance costs

E. ALTERNATIVES

- 1. How is the Town getting the function or functions of this project accomplished now? Town supplies emergency response vehicles.
- 2. What are the problems with the current method of accomplishing those functions? No issues other than age and dependability of the vehicle.
- 3. How was the project proposal determined? Age of vehicle in emergency response.
- 4. What alternatives have not yet been considered? No known alternatives for vehicles equipped to provide emergency response.

F. FUNDING

- 1. What source or sources of funding does the sponsor propose, and why? Capital Budget. Historically funded from Capital Budget.
- 2. Can this project be legally bonded? unknown
 - a. If not the whole, what parts?
 - b. For what term?
- 3. Are there revenue sources within this project? No
 - a. What are they?
 - b. How much might they yield on an annual basis?
- 4. What would be involved in implementing them? Are grants or reimbursements available for any part(s) of this project? No
 - a. What are they?
 - b. How much might be realized from them?
 - c. Who must consent or make the grant?
 - d. What is the time schedule imposed by the grant or reimbursement process? How does that time schedule fit with (what would otherwise be) the construction schedule?
 - e. What other requirements are imposed by the grant or reimbursement process?

G. LOCATION

- 1. Has the proposed location for the project been chosen? Yes, Fire Department
- 2. Is the proposed location currently available and in the control of the Town authority or committee who is proposing the project? **Yes**
- 3. If not, from whom must the location be acquired or by whom must its use be authorized?
- 4. What is the process for making the location available? How recent is that estimate and how was it derived?
- 5. What issues, besides control and price, if any, does the proposed location present?

NOTE: These questions (and others) may be more for the Committee and Town Officials than for the project sponsors.

CAPITAL PROJECT TEMPLATE

A. THE BASIC PROJECT

- 1. What is the project? Fire Department Squad 1 Replacement
- 2. Where would it be located? (see location G below) Fire Headquarters
- 3. What is the estimated cost? \$12,000
 - a. How recent is the currently available estimate? January 2017
 - b. How was the currently available estimate derived? Verbal

Estimates from vendors

B. PERSONS INVOLVED

- 1. Who is the sponsor of the project? Fire Department
- 2. Who, specifically, would supervise the project? Chief or Assistant Chief
- 3. Who would use the completed project?
 - a. By class or group. Fire Department Firefighters
 - b. Estimated numbers (how estimated.) 54 Uniform members
- 4. Who has to agree to authorize the project (see funding and location, dealt with a G and G below.) Town Administrator, Selectmen, Warrant Committee, Capital Budget Committee, Town Meeting.
- 5. Who, as a practical matter, has to cooperate to get the project completed? See Above

C. TIMING, DELAY AND DENIAL

- 1. Is this project ready to be implemented now? Yes, incoordination with DPW
- 2. If not, what remains to be done before the project is undertaken?
- 3. When does the sponsor propose that the project be undertaken, and why? As soon as possible. Current vehicle is 18 years old. DPW is disposing of a vehicle which would be appropriate for Fire Department use.
- 4. How long will it take to complete the project and what are the important milestones along the way? 2-3 months after DPW gets their vehicle
- What are the consequences of delay? Denial? (see alternatives below.) Delayed replacement will caused increased maintenance and repair costs.
- 6. With what other project or projects should this project be coordinated? Replacement of DPW truck.
 - a. Why? The DPW truck will be the source for our replacement vehicle
 - b. How; precede, simultaneous, succeed?
- 7. What is the life of the project? This truck should last 5-8 years.
- 8. Can the project be phased or broken into subprojects? No
 - a. How? (or why not?) Single vehicle.
 - b. What are the advantages and disadvantages of phasing?
 - c. Each subproject or phase should be analyzed as if it were a project itself; in other words, what are the answers to each question in this template regarding each possible subproject?

CAPITAL PROJECT TEMPLATE

D. OPERATING BUDGET

- 1. What are the implications of this project for the current Operating Budget?

 Increased repair and operating expenses. Deferred repairs. Long term impact on increased operating and repair expenses.
- 2. Who will be responsible for this project once it is completed? Fire Department
- 3. Will this project result in an increase? or decrease? In personnel. No change
- 4. What maintenance will this project require when it is completed? an increase? or decrease over the present. No significant change in overall Department maintenance costs

E. ALTERNATIVES

- 1. How is the Town getting the function or functions of this project accomplished now? **Town supplies emergency response vehicles.**
- What are the problems with the current method of accomplishing those functions?

 No issues other than age and dependability of the vehicle.
- 3. How was the project proposal determined? Age of vehicle and timing of DPW disposal of vehicle.
- 4. What alternatives have not yet been considered? No known alternatives for vehicles equipped to provide emergency response.

F. FUNDING

- What source or sources of funding does the sponsor propose, and why? Capital Budget. Historically funded from Capital Budget.
- 2. Can this project be legally bonded? unknown
 - a. If not the whole, what parts?
 - b. For what term?
- 3. Are there revenue sources within this project? No
 - a. What are they?
 - b. How much might they yield on an annual basis?
- 4. What would be involved in implementing them? Are grants or reimbursements available for any part(s) of this project? **No**
 - a. What are they?
 - b. How much might be realized from them?
 - c. Who must consent or make the grant?
 - d. What is the time schedule imposed by the grant or reimbursement process? How does that time schedule fit with (what would otherwise be) the construction schedule?
 - e. What other requirements are imposed by the grant or reimbursement process?

G. LOCATION

1. Has the proposed location for the project been chosen? Yes, Fire Department

CAPITAL PROJECT TEMPLATE

- 2. Is the proposed location currently available and in the control of the Town authority or committee who is proposing the project? **Yes**
- 3. If not, from whom must the location be acquired or by whom must its use be authorized?
- 4. What is the process for making the location available? How recent is that estimate and how was it derived?
- 5. What issues, besides control and price, if any, does the proposed location present?

NOTE: These questions (and others) may be more for the Committee and Town Officials than for the project sponsors.



BELMONT FIRE DEPARTMENT

HEADQUARTERS
299 TRAPELO ROAD
PO BOX 421
BELMONT, MASSACHUSETTS 02478

TELEPHONE 617-993-2200 FAX 617-993-2201 EMAIL dfrizzell@belmont-ma.gov

Mr. David Kale Town Administrator Town Hall Belmont, Massachusetts 02478

January 10, 2017

RE: Fire Department Capital Budget request for FY 2018 and capital needs report.

Dear Mr. Kale:

The Fire Department would like to take this opportunity to update you on its Capital Budget projects and needs. It is our hope that this report aids you and the Capital Budget Committee in making decisions and future planning on the Capital budget. I have reviewed the current condition of Capital items and have updated the Department's Capital Budget plan for next fiscal year and beyond.

The Fire Department has taken each project and reviewed it. The attached report will hopefully answer the questions for the Capital Budget Committee. There are no new requests for Fiscal Year 2016.

FY2017 Request

Replace 2 staff response vehicles
 Squad 1 Replacement
 Cardiac Monitor Replacement
 Ambulance Replacement year 1 of 5
 \$ 114,400
 \$ 12,000
 \$ 35,000 (\$28,000 already appropriated)
 \$ 65,000

I am available to discuss the future Fire Department Capital Budget requests, with you or the Capital Budget Committee. If you need additional information please feel free to contact me.

Sincerely,

David L. Frizzell
Chief of Department

Dud 1. Lypell

BELMONT

FIRE DEPARTMENT

CAPITAL BUDGET

NEEDS ASSESSMENT

FY 2018

&

BEYOND

Report Completed by the Belmont Fire Department Staff January 2017 This information has been assembled to inform the Capital Budget Committee on the Fire Department's Capital Budget current and future needs. The items contained in this report are those that are known at the time of this report and may change in future years as the Department's needs change. The cost estimated for future projects are the best estimate of what current costs are, and will be adjusted annual as a report is prepared.

We have looked at each upcoming project and have adjusted the Fire Department's Capital Budget program. As you are aware, many of these items appear on a department's list many years before they are needed. As the time span shortens we become more focused and revise the program. At the Capital Budget Committee's request we have also tried to space out our "larger" vehicles out over different fiscal years.

Thinking Outside the Box

The Fire Department, as well as the Town, must creatively think of ways to accomplish our goals while maintaining fiscal responsibility. The Department has also reviewed each of the projects on the list. This review has allowed us to make some changes to the schedule for replacement. As you may recall the CBC initiated a lease program in FY2012 that assisted the Department in receiving funding for a major portion of its Capital Budget. More recently the purchase of the Ladder Truck and Engine were bonded to spread the cost of these items out over many fiscal years.

The Fire Department looks at its requests with many differing view points. The first and most important is the requested project **must** meet operational needs of the Department's mission. Secondly is to look at it from a business perspective. Some of the questions we look at are: is it cost effective? What is the payback? Are there less expensive reliable options? We also try to look prospectively to try and mitigate operating costs and or potential liability for the Town. Lastly is we have to make sound judgments as we don't have the luxury of making poor choices as the money won't be available to correct the situation

The Fire Department, like the rest of the Town's departments, struggles with its Capital Budget program. The Department gives the Capital Budget Committee accurate projections of equipment needs and the anticipated replacement time. The Department has been realistic in its projections. Some items on the list have the ability to be deferred a year but many of the "emergency" response equipment items cannot. In an attempt to help the Capital Budget Committee I will identify those items in the future years' projections that have critical replacement dates associated with them. The Department does not want to be placed in a position of asking for Capital Budget items three to four years ahead of time so as they will ultimately get replaced when needed.

Update on Current Projects

Currently, the Department is in the process of administering our FY2017 Capital Budget programs. We continue the annual appropriation to the EMS Equipment Replacement Account, established as part of the Advanced Life Support program. There is no action to report by the Department.

Turnout Gear Replacement FY2017

Approximately half the Department's current turnout gear (personal protective equipment or PPE) was purchased through a Federal Grant in 2008. The National Fire Protection Association NFPA 1851: "Standard on Selection, Care, and Maintenance of Protective Ensembles for Structural Fire Fighting and Proximity Fire Fighting" now dictates the length of service turnout gear or "protective ensemble" can remain in service. Although NFPA 1851 has been around for a number of years its application has been left up to an individual department. More recently, the 10 year life limit, on turnout gear, has been enforced by national and State organizations. Currently, the Massachusetts Firefighting Academy will not allow a participant to attend training if their turnout gear is out of compliance which includes being more than 10 years old. This means that approximately 25 sets of gear will fall out of compliance in 2018.

This project is well underway and is being funded through multiple sources. FY2017 purchase of turnout gear will being done in 3 distinct rounds. This will spread the acquisition over 2 calendar year thereby spreading out replacements in the future and allows the project to be more manageable.

Ambulance Replacement FY2017

The Department has assembled a volunteer committee to review the current ambulance specifications and what is available given the budget. In the near future a purchase will be made using the MAPC Bid process. It is estimated it will take 7 or 8 months for the Rescue to arrive in Town.

FISCAL YEAR 2018 NEEDS

Cardiac Monitor Replacement

The original cardiac monitor will be five years old. The plan established 4 years ago has appropriated \$7,000 per year towards the \$35,000 replacement. This will be the 5th year of plan. The unit will be replaced with a monitor purchased off the State Bid List. The old unit will be refurbished and kept as a spare. The fiscal impact to FY 2018 is \$7,000 and is funded from ambulance revenues.

Staff Vehicle Replacements (2 vehicles)

One of these vehicles was deferred from FY2017 Capital request. The second vehicle is on the FY2018 Schedule for replacement. The Department needs to replace both 2007 vehicles. The events of the past year have demonstrated the urgent need to replace and maintain our vehicles. The recent loss of two vehicles and the lack of a spare vehicle meant the Department's operations were compromised for a considerable amount of time. The Department needs a reserve staff vehicle to be used when other vehicles are receiving maintenance or repairs and during fires and other multi-agency incident responses. One of the current 2007 vehicles would be retained as a spare. The cost for each of the replacements vehicles and equipment is \$57,200 or total request of \$114,400.

Replace Squad 1

The current Squad 1 is a transfer from the Highway Department and is 18 years old. It has seen some rough duty first plowing the streets of Belmont and in its second career as a utility plow truck and brush truck for the Department. The current truck has some issues of chronically killing the batteries which has been unable to be resolved. In discussions with the DPW they are again getting rid of the Highway Department's #9 which is a 2008 Ford F550. The Fire Department would swap our current Squad 1 for their #9 (thus allowing for a trade-in). The newly acquired truck would have the dump body removed, have the frame sand blasted and painted, and the cab of the truck would be painted. It would then be lettered up, have the body moved over and emergency warning lights and communications equipment installed. It is estimated this work can be completed for \$12,000. This would meet the needs of the Fire Department's service and be far short of the \$60,000+ for a new cab and chassis.

EMS Equipment Replacement Fund

The Department has elevated its level of ambulance service to Advanced Life Support (ALS). As part of the increase in service there will be an increase the amount the Town is able to charge a patient for the ALS care. Those increased fees will result in additional revenue to the Town. As part of this new endeavor, the Town must make sure there is a plan in place to replace both the ambulance and EMS equipment like the Cardiac Monitor. In Fiscal 2018 the sum of \$72,000 is needed to ensure there are sufficient funds for equipment replacement. The funding for this appropriation comes from Ambulance revenue and appropriated for the replacement of the required equipment. \$65,000 will be appropriated for the purchase of the ambulance in 2022 and \$7,000 will be appropriated for the cardiac monitor replacement.

Spill Response Trailer \$25,000

This item has remained on the Department's request for a number of years. The Department has identified the need for a spill response trailer. Past events, like the Burbank oil leak, and other



products showing up in the Clay Pit Pond have shown that the Department needs more resources than we currently have. It is vital to reduce the negative environmental impact of a spill. Having these resources readily available to control the spill will reduce the financial and environmental exposure to the Town. As this request seems never to make the "cut" we are exploring other funding options.

Summary

The table in the next section, projects the known capital expenses for the upcoming years. Cost estimates are developed using **today's** known costs or estimates. It should be noted that most specialized equipment has very long lead times and apparatus lead time can be a year or more. There are items that are not in this capital budget report that may appear in future years. The Department has been actively seeking funding to mitigate the impact on the Capital Budget and the Capital portion of the Operating Budget.

We at the Fire Department understand and appreciate the work that the Capital Budget Committee must accomplish given the limited financial resources available. We look forward to discussing the Department's capital needs with the Town Administrator and the Capital Budget Committee.

					Notes
Fiscal Year	Priority	Item	Current Cost	Need	Notes
2018					Deferred from FY2017
2017	High	Staff Vehicle	\$57,200		
2018		Cardiac Monitor Replacement	\$7,000		\$28,000 from EMS Equipment Replacement
2018		Replace Squad 1 (1999 Ford)	\$12,000		Hand down of DPW #9 & Refurb
2018		Replace Staff Vehicle	\$57,200		11 year old vehicle
2018		Ambulance Replacement Year 1 of 5	\$65,000		From EMS Revenue
2009		Spill response trailer	\$25,000	Urgent	Environmental Mitigation
2018		Total	\$223,400		
2019		Replace 2003 Pumper	\$625,000		
2019		Ambulance and EMS Equipment Replacement			From EMS Revenue
2019		Total	\$697,000		
2019 P2020					
2020		Replace Shift Commander's Response vehicle			
= 2020		Ambulance and EMS Equipment Replacement			From EMS Revenue
2020		Total	\$132,000		
P.					
2021		Portable Radio Replacement	\$120,000		

2021		Ambulance and EMS Equipment	\$72,000		From EMS Revenue
		Replacement			
2021		Total	\$192,000		
					S. Jan Spirit and State of the
2022				1	
2022		Replace Ambulance	\$65,000		From EMS Revenue
2022		EMS Equipment Replacement	\$7,000		From EMS Revenue
2022		Total	\$72,000		
	87 197 198				
2023					
2023		Replace Staff Car	\$57,200		
2023		Replace Cardiac Monitor	\$7,000		\$7,000 from EMS Revenue \$28,000 previously appropriated
2023		Ambulance Replacement	\$65,000		From EMS Revenue
2023		Replace 2005/2014 Engine	\$625,000		
2023		Total	\$754,200		
2027		Replace 2007 Engine	\$625,000		Replace 20 year old pumper
2029		Replace 2014 Ladder Truck	\$1,040,000		
Italicized are prior		·			
Ounfunded					
Brequest					
request					
_					

age 72

FIRE DEPARTMENT FUTURE PROJECTS

The Department has identified these urgent needs for upcoming fiscal years. The Department has invested a lot of time in identifying and categorizing these Capital needs. The chart in the previous section has established the Department projected future needs. We have included a brief description of the CBC items for Fiscal Years 2019 & 2020.

FY2019

There are two projects planned for this fiscal year. The first is the funding for the EMS equipment and ambulance from EMS revenue. The second request is to replace the frontline 2005 engine and dispose of the reserve 2003 engine.

FY2020

There is the ongoing Capital request to fund EMS equipment and ambulance replacement. The second request is to replace the shift commander's response vehicle.

FIRE DEPARTMENT FLEET VEHICLE REPORT January 2017

We have developed a practice of requesting a vehicle in the Capital Budget Program in the year replacement is projected. We have developed a plan to maximize the use of a vehicle and to minimize the expense to the taxpayers. A constant evaluation is conducted on vehicle usage and vehicle condition. This evaluation allows the Department flexibility to transfer vehicles within the Department to meet our goals.

Vehicles are broken up into different categories. Large apparatus response vehicles are engines and ladder trucks. These vehicles are the most expensive but generally are in "front line" service responding to calls for 10 to 15 years. The second category is the cars or staff vehicles. We have experienced better service with these vehicles currently than in previous years. This experience has allowed us to revise our current replacement strategy. It should be noted that after approximately six years of day in and day out fire response, the cost to maintain and operate these vehicles increases (negative effect on operating budget). For vehicles used for administrative or staff duties the life expectancy of a vehicle is approximately ten years (again this may require rotating vehicles within the Department to maximize life expectancy). We have not experienced good service or reliability on vehicles that are required to be in service beyond 10 years. History has shown that these assumptions have proven true.

As previously mentioned the Department has explored alternate fueled environmentally friendly vehicles but have not had great success in being able to find a cost effective AFV that also meets the Department's needs.

THE FIRE DEPARTMENT FLEET

Engine 1 is a 2014 Emergency One E-Max Typhoon 1250 GPM pumper. It has 10,970 miles and 1191 hours. This piece of apparatus is used 24 hours a day as a primary response engine to emergencies from the Headquarters Station on Trapelo Road. Repair costs for 2016 were \$923.

Engine 2 is a 2005 Emergency One Typhoon 1250 GPM pumper. It has 55,033 miles and 6744 hours. This piece of apparatus is used 24 hours a day as a primary response engine to emergencies from Station 2 in Belmont Center. Repair costs for 2010 were \$3457, 2011 were \$9,704, 2012 were \$10,255, 2013 were \$4,036, 2014 were \$6116, 2015 were \$19,865, and 2016 were \$3857 (with invoices for December still due).

Engine 3 is a 2007 International Emergency One 1000 GPM pumper. It has 8966 miles. This piece of apparatus is primary reserve apparatus at Station 2. It is equipped with 4 wheel drive and is also used for brush fires, during periods of severe weather conditions, and when addition apparatus is needed at incidents. This vehicle is ready for response from Station 2 in Belmont Center. Repair costs for 2011 \$397, 2012 were \$505, 2013 were \$379, for 2014 were \$453, for 2015 were \$1,388 and for 2016 were \$256.

Engine 4 is a 2003 Emergency One Typhoon 1250 GPM pumper. It has 64,935 miles and 8416 hours. This piece of apparatus is primary reserve apparatus at Headquarters. It will also be used for special details and large scale incidents. This vehicle is ready for response from Fire Headquarters on Trapelo Road. Repair cost for 2010 were \$13,037, 2011 were \$15,341, 2012 were \$6,943, 2013 were \$2,403, 2014 were \$12,517, for 2015 were \$15,494, and \$3,849 for 2016.

Ladder 1 is 2014 Emergency One 110' Ladder truck. It has 6154 miles and 763 hours of operation. This piece of apparatus is used 24 hours a day as a the primary response ladder truck. This is the Town's only staffed ladder truck. In addition to the ladders, this truck carries all of the extrication and rescue equipment. This vehicle responds from Station 2 in Belmont Center. Repairs for 2015 were \$221, and 2016 were \$2,032 (with repair invoices for December still pending).

Ladder 2 is a 1999 Emergency One 110' Ladder truck. It has 62,730 miles (hour meter out of service). This piece of apparatus is used when the primary Ladder Truck is out of service, or when needed for special details. This vehicle is equipped and ready for response from Station 2 in Belmont Center. Repair costs for 2010 were \$7059, for 2011 were \$27,240, 2012 were \$24,128, 2013 were \$12,360, 2014 were \$14,896, for 2015 were \$16,563, and for 2016 were \$845.

Rescue 1. is a 2012 Ford Horton Ambulance. It has 56,124 miles. This vehicle is used 24 hours a day as the primary response ambulance. The Rescue responds to both EMS and fire calls. This vehicle is staffed with two firefighter EMT's and responds from the Headquarters Station. Repair costs for 2012 were \$704, 2013 were \$1,409, 2014 were \$2291, for 2015 were \$4,403, and for 2016 were \$5,421.

Rescue 2 is a 2007 GMC Horton Ambulance. It has 78,002 miles. This vehicle is ready for response from Fire Headquarters on Trapelo Road and is often staffed as an additional ambulance, during storms, from Station 2 in Belmont Center. Repair costs for 2011 were \$7,934, 2012 were \$4,526, 2013 were \$3,635, 2014 were \$2441, for 2015 were \$718, and for 2016 were \$6,091.

Car 1 This 2013 Ford Interceptor Utility with 42,071 miles. This vehicle is assigned to and used by the Chief of Department for Department business and to maintain an on-call availability. It is outfitted with response equipment and responds to emergencies as required. This vehicle, along with the Chief, is available to respond 24 hours a day. Repair cost for 2013 were \$1,271, and repair costs for 2014 were \$762, for 2015 were \$977, and for 2016 were \$1,574.

Car 2 is a 2007 Ford Explorer with 32,217 miles. This vehicle is assigned to and used by the Assistant Chief of Department for Department business and to maintain an on-call availability. It is outfitted with response equipment and responds to emergencies as required. This vehicle, along with the Assistant Chief, is available to respond 24 hours a day. Repair costs for 2011 were \$26.70, 2012 were \$348, 2013 were \$78, 2014 were \$1,366.58, for 2015 were 28.18, and for 2016 were \$596.

Car 3 Is a 2015 Ford Expedition with miles 6054. This vehicle is used as the primary response vehicle for the Shift Commander. It is equipped with emergency equipment, communications equipment, and incident command tools. Repair costs for 2016 were \$3,805.

Car 4 is a 2007 (purchased in 2006) Ford Expedition with 61,088 miles. This is assigned to and used by the Fire Prevention Officer. It is used during normal work days to provide transportation around the Town for inspections and other Fire Prevention duties. It is equipped with emergency response equipment and is available to respond to emergencies as needed. This vehicle is also used for Hazmat responses and for covering Shift Commanders during emergency incidents. During non-work hours this vehicle is ready for response at Fire Headquarters on Trapelo Road. Repair costs for 2011 were \$1,292, 2012 were \$192, 2013 were \$105, 2014 were \$59.85, for 2015 were \$6,300, and for 2016 \$184.

Car 5 is a 2015 Ford F150 Pickup truck with 3,465 miles. This vehicle was obtained after the 2009 Chevy Tahoe (former Car 3) was totaled in a fire. This vehicle is new to the fleet but has incurred almost \$16,000 of expenses in 2015, out of the repair and maintenance budget, due to the shortfall in the insurance proceeds needed to acquire and outfit the vehicle. The repair costs for 2016 were \$50.

Squad 1 is a 1999 Ford F-450 truck with 45,156 miles on it. This vehicle was a transfer in 2009 from the DPW. This vehicle is used to tow any of the Department trailers. It is also capable of plowing snow, it is helpful during brush fires and is used for general equipment moving. It is outfitted with limited emergency equipment. It is available at the Headquarters Fire Station on Trapelo Road. Repair costs for 2011 were \$239, 2012 were \$507, 2013 were \$57, 2014 were \$256, for 2015 were \$1,053, and for 2016 are still being gathered at the time of this report.

Trailers

Technical Rescue 18' cargo trailer to carry rescue equipment.

Light Tower Town of Belmont equipment used for emergency lighting needs

Boat Trailer used to transport boat and water rescue equipment.

Summary The Fire Department has a total of 14 motorized vehicles and 3 trailers. Of the 14 motorized vehicles there are 6 pieces of major apparatus, 2 ambulances, 5 cars and 1 utility truck.

CAPITAL PROJECT TEMPLATE FACILITIES DEPARTMENT

Priority: #1- Town/School Security Upgrades

A. THE BASIC PROJECT

What is the project? Phase 4 of this multi-year project will consist designing, procuring and installing additional security cameras as needed in all Town and School buildings. This is Year 4 of a 6-Year plan.

- Where would it be located? (see location G below) It would be located in the Town's present locations: Town & School Buildings.
- 3. What is the estimated cost? The estimated cost is \$200,000.
 - a. How recent is the currently available estimate? This is based on a January 2016 estimate.
 - b. How was the currently available estimate derived? Review with Facilities and IT staff.

B. PERSONS INVOLVED

- 1. Who is the sponsor of the project? Belmont Facilities Department.
- 2. Who, specifically, would supervise the project? Supervisor of Contracts Management, Facilities Department
- 3. Who would use the completed project?
 - a. By class or group: All Town and School departments who presently have access to the existing security system.
 - b. Estimated numbers (how estimated.)? NA
- 4. Who has to agree to authorize the project? Public Facilities Board.
- 5. Who, as a practical matter, has to cooperate to get the project completed? Facilities Department, SPAG members including School and Town IT departments.

C. TIMING, DELAY AND DENIAL

- 1. Is this project ready to be implemented now? The project is ready to go upon funding.
- 2. If not, what remains to be done before the project is undertaken?
- 3. When does the sponsor propose that the project be undertaken, and why? The project will begin as soon as the procurement process begins.
- 4. How long will it take to complete the project and what are the important milestones along the way? The project can be completed in FY18, driven by our planning and prioritizing equipment replacement and video storage.
- 5. What are the consequences of delay? Denial? (see alternatives below) The project is in need of implementation due to the age and condition of Town and School security hardware and software.
- 6. With what other project or projects should this project be coordinated? This is a stand-alone project, but will be integrated with ongoing upgrades and modifications to the infrastructure of Town and School security systems.
- 7. What is the life of the project? The life of the project varies on the type of equipment and software upgrades required.

- 8. Can the project be phased or broken into subprojects? The project can and will be phased based on funding and management time to implement the consultant's report. The initial design needs to move ahead in FY 2018.
 - a. How? The project can be phased based on funding.
 - b. What are the advantages and disadvantages of phasing? The advantage is that the project will have a more defined start and end time and everyone involved with can see the project through.
 - Each subproject or phase should be analyzed as if it were a project itself; in other words, what are the answers to each question in this template regarding each possible subproject?
 N/A

D. OPERATING BUDGET

- 1. What are the implications of this project for the current Operating Budget? There would be no immediate impact on the Operating Budget. Over time, minor increases may be realized in preventive maintenance of the equipment.
- 2. Who will be responsible for this project once it is completed? Those presently responsible will continue unless Facilities take over responsibility for the School security.
- 3. Will this project result in an increase or decrease in personnel? There would be no change.
- 4. What maintenance will this project require when it is completed? An increase? Or decrease over the present. The maintenance of the upgrades will have no impact until FY2019 at the earliest. Warranties and maintenance should be part of the upgrades.

E. ALTERNATIVES

- 1. How is the Town getting the function or functions of this project accomplished now? The present system is at risk since the video recording exposes the network to being hacked.
- 2. What are the problems with the current method of accomplishing those functions? See E.1.
- 3. How was the project proposal determined? Town IT recognized the potential issues in June 2014
- 4. What alternatives have not yet been considered? None as expansion can only be accomplished with new equipment.

F. FUNDING

- 1. What source or sources of funding does the sponsor propose, and why? Capital Budget Funding
- 2. Can this project be legally bonded? Yes
 - a. If not the whole, what parts? N/A.
 - b. For what term? Per the discretion of the Treasurer.
- 3. Are there revenue sources within this project? No.
 - a. What are they?
 - b. How much might they yield on an annual basis?
 - c. What would be involved in implementing them?
- 4. Are grants or reimbursements available for any part(s) of this project? No.
 - a. What are they?
 - b. How much might be realized from them?
 - c. Who must consent or make the grant?
 - d. What is the time schedule imposed by the grant or reimbursement process? How does that time schedule fit with (what would otherwise be) the construction schedule?
 - e. What other requirements are imposed by the grant or reimbursement process?

G. LOCATION

- 1. Has the proposed location for the project been chosen? Yes, all of those building presently with security devices.
- 2. Is the proposed location currently available and in the control of the Town authority or committee who is proposing the project? Yes
- 3. If not, from whom must the location be acquired or by whom must its use be authorized? N/A.
- 4. What is the process for making the location available? How recent is that estimate and how was it derived? N/A.
- 5. What issues, besides control and price, if any, does the proposed location present? This question raises the issue of the Facilities Department managing security in the Schools.

These questions (and others) may be more for the Committee and Town Officials than for the project sponsors.

CAPITAL PROJECT TEMPLATE FACILITIES DEPARTMENT

Priority: #2 - System Wide Building Envelope Improvements

A. THE BASIC PROJECT

- 1. What is the project? System wide School Building envelope (year 8 of multi-years, 10/2007 Build. Envelope Study)
- 2. Where would it be located? (see location G below)
- 3. What is the estimated cost? \$200,000
 - a. How recent is the currently available estimate? N/A
 - b. How was the currently available estimate derived? Estimated annual allotment to fund the on-going upkeep of the School buildings to prevent further repairs that would result from deferred maintenance.

B. PERSONS INVOLVED

- 1. Who is the sponsor of the project? Belmont Facilities Department
- 2. Who, specifically, would supervise the project? Supervisor of Contracts Management, Facilities Department
- 3. Who would use the completed project? Individual schools.
 - a. By class or group.
- All users
- b. Estimated numbers (how estimated.) N/A

 4. Who has to agree to authorize the project (see funding and location, dealt with a C and G
- 5. Who, as a practical matter, has to cooperate to get the project completed? School staff.

C. TIMING, DELAY AND DENIAL

below.)

- 1. Is this project ready to be implemented now? No.
- 2. If not, what remains to be done before the project is undertaken? Specifications and bidding.
- 3. When does the sponsor propose that the project be undertaken, and why? Design development and bidding will occur during winter months with on-site work anticipated for Summer 2018.
- 4. How long will it take to complete the project and what are the important milestones along the way? Two months for specifications and bidding, three months for submittals and possible window fabrication, two months of construction. Specifications, bidding and submittal approval are milestones.
- 5. What are the consequences of delay? Denial? (see alternatives below.) Continued water infiltration, potential mold issues and poor energy efficiency.
- 6. With what other project or projects should this project be coordinated? N/A
 - a. Why?
 - b. How; precede, simultaneous, succeed?
- 7. What is the life expectancy of the project? All building envelope repairs would have a 20-year life expectancy
- 8. Can the project be phased or broken into subprojects? Yes.
 - a. How? (or why not?) It would be advantageous to confine this phase of the multi-year projects to a single building.
 - b. What are the advantages and disadvantages of phasing? Cost savings and fewer disruptions to contain work to one building.
 - c. Each subproject or phase should be analyzed as if it were a project itself; in other words, what are the answers to each question in this template regarding each possible subproject? Subprojects would have similar answers.

OPERATING BUDGET D.

- What are the implications of this project for the current Operating Budget? Possible reduction of 1. maintenance repairs, reduced energy consumption.
- Who will be responsible for this project once it is completed? Facilities Department will be 2. responsible to maintain the installed work.
- Will this project result in an increase? or decrease? In personnel. None. 3.
- What maintenance will this project require when it is completed? an increase? or decrease over the 4. present. A reduction in unscheduled maintenance.

ALTERNATIVES E.

- How is the Town getting the function or functions of this project accomplished now? Town lives 1. with less than optimal building envelope conditions.
- What are the problems with the current method of accomplishing those functions? Reliance on 2. reactive unscheduled maintenance and repairs.
- How was the project proposal determined? 2007 Russo Barr Associates study. 3.
- What alternatives have not yet been considered? N/A 4.

F. **FUNDING**

- What source or sources of funding does the sponsor propose, and why? Capital budget. 1.
- Can this project be legally bonded? 2.
 - Yes. If not the whole, what parts? а
 - For what term? b.
- Are there revenue sources within this project? No. 3.
 - What are they? а
 - How much might they yield on an annual basis? b.
 - What would be involved in implementing them?
- Are grants or reimbursements available for any part(s) of this project? No. 4.
 - What are they? а
 - How much might be realized from them? b.
 - Who must consent or make the grant? c.
 - What is the time schedule imposed by the grant or reimbursement process? d. How does that time schedule fit with (what would otherwise be) the construction
 - What other requirements are imposed by the grant or reimbursement process? e.

LOCATION G.

- Has the proposed location for the project been chosen? To be determined based on funding 1. amount and completion of prior work.
- Is the proposed location currently available and in the control of the Town authority or committee 2. who is proposing the project? Yes.
- If not, from whom must the location be acquired or by whom must its use be authorized? 3.
- What is the process for making the location available? How recent is that estimate and how was it 4. derived?
- What issues, besides control and price, if any, does the proposed location present? None. 5.

These questions (and others) may be more for the Committee and Town Officials than for the project sponsors.

CAPITAL PROJECT REQUEST FACILITIES DEPARTMENT

Priority project #3 – Purchase HVAC Technician Van

THE BASIC PROJECT A.

- What is the project? Purchase of one new utility van for use by Facilities Department HVAC technician. Cost includes all interior set of shelving to accommodate required equipment. 1.
- Where would it be located? DPW Highway yard, 37 C Street 2.
- What is the estimated cost? \$30,000. 3.
 - How recent is the currently available estimate? January 2017
 - How was the currently available estimate derived? Cost estimate from local Ъ. dealer.

PERSONS INVOLVED В.

- Who is the sponsor of the project? Belmont Facilities Department. 1.
- Who, specifically, would supervise the project? Supervisor of Contracts Management 2.
- Who would use the completed project? Facilties Department 3.
 - By class or group.
 - Estimated numbers (how estimated.) one technician
- Who has to agree to authorize the project (see funding and location, items F and G below.) -4.
- Belmont Public Facilities Board. Who, as a practical matter, has to cooperate to get the project completed? DPW staff and 5. Belmont Facilities Department.

TIMING, DELAY AND DENIAL C.

- Is this project ready to be implemented now? Yes. 1.
- If not, what remains to be done before the project is undertaken? Select vendor from State bid 2.
- When does the sponsor propose that the project be undertaken, and why? ASAP to immediately 3. facilitate a recent hire
- How long will it take to complete the project and what are the important milestones along the 4. way? No delay as purchase can be made on July 1, 2017
- What are the consequences of delay? Denial? (see alternatives below.)- Continued expense to 5. lease a vehicle for this use.
- With what other project or projects should this project be coordinated? N/A 6.
 - а Why?
 - How; precede, simultaneous, succeed? b.
- What is the life of the project? 15 years with proper maintenance 7.
- Can the project be phased or broken into subprojects? No. 8.
 - How? (or why not?) It is a single item at a single location that must be 100% complete at once.
 - What are the advantages and disadvantages of phasing? Unable to phase this b.
 - Each subproject or phase should be analyzed as if it were a project itself; in other words, what are the answers to each question in this template regarding each possible subproject? This project can't be phased. Therefore, no subprojects to list.

D. OPERATING BUDGET

- 1. What are the implications of this project for the current Operating Budget? Additional fuel consumption costs.
- 2. Who will be responsible for this project once it is completed? Facilities Department
- 3. Will this project result in an increase? or decrease? In personnel. N/A
- 4. What maintenance will this project require when it is completed? an increase? or decrease over the present. N/A.

E. ALTERNATIVES

- 1. How is the Town getting the function or functions of this project accomplished now? Lease
- 2. What are the problems with the current method of accomplishing those functions? **Inefficient** payments for long term.
- 3. How was the project proposal determined? Hiring of position of HVAC Tech
- 4. What alternatives have not yet been considered? Continue with lease

F. FUNDING

- 1. What source or sources of funding does the sponsor propose, and why? Capital Budget Committee. This is not a recurring maintenance items that is appropriate for operating budget.
- 2. Can this project be legally bonded? Yes.

c.

- a. If not the whole, what parts?
- b. For what term?
- 3. Are there revenue sources within this project? No.
 - a. What are they?
 - b. How much might they yield on an annual basis?
 - What would be involved in implementing them?
- 4. Are grants or reimbursements available for any part(s) of this project? No
 - a. What are they?
 - b. How much might be realized from them?
 - c. Who must consent or make the grant?
 - d. What is the time schedule imposed by the grant or reimbursement process?

 How does that time schedule fit with (what would otherwise be) the construction schedule? N/A
 - e. What other requirements are imposed by the grant or reimbursement process?

G. LOCATION

- 1. Has the proposed location for the project been chosen? Yes, DPW yard at 37 C Street.
- 2. Is the proposed location currently available and in the control of the Town authority or committee who is proposing the project? **Yes.**
- 3. If not, from whom must the location be acquired or by whom must its use be authorized? N/A
- 4. What is the process for making the location available? N/A
- 5. How recent is that estimate and how was it derived? January 26 from local dealer
- 6. What issues, besides control and price, if any, does the proposed location present? N/A

These questions (and others) may be more for the Committee and Town Officials than for the project sponsors.

CAPITAL PROJECT TEMPLATE FACILITIES DEPARTMENT

Priority: #4- Chenery Middle School Univent Repairs

THE BASIC PROJECT A.

- What is the project? Repair of Chenery Middle School Univents. The motors and other component parts are breaking down consistently. The existing units can remain; however, the component parts need to be replaced. There is a univent heater in each classroom and office as well as in the corridors. Any classroom or other area serviced by a malfunctioning univent heater will not receive any heat. This request will be Year 5 of multiple years.
- What is the estimated cost? \$50,000
 - How recent is the currently available estimate? January 2017
 - How was the currently available estimate derived? Review of scope of work with b. current HVAC vendor.

PERSONS INVOLVED В.

- Who is the sponsor of the project? Facilities Department 1.
- Who, specifically, would supervise the project? Supervisor of Contracts Management 2.
- Who would use the completed project? Individual schools. 3.
 - All users By class or group. a.
 - Estimated numbers (how estimated.) N/A Ъ.
- Who has to agree to authorize the project (see funding and location, dealt with C and G below.) 4.
- Who, as a practical matter, has to cooperate to get the project completed? School staff. 5.

TIMING, DELAY AND DENIAL C.

- Is this project ready to be implemented now? No. 1.
- If not, what remains to be done before the project is undertaken? Develop scope of work for 2. review with current HVAC Maintenance vendor.
- When does the sponsor propose that the project be undertaken, and why? Immediately to 3.
- provide comfort and energy savings benefits. How long will it take to complete the project and what are the important milestones along the 4. way? Two months for scope development, three months of construction. Scope development
- and pricing agreement are milestones. What are the consequences of delay? Denial? (see alternatives below.) Uncomfortable heat 5. conditions and additional energy expense.
- With what other project or projects should this project be coordinated? N/A 6.
 - Why? a.
 - How; precede, simultaneous, succeed? b.
- What is the life of the project? Univent upgrades and repairs should have a life expectancy of 7.
- Can the project be phased or broken into subprojects? Yes. 8.
 - How? (or why not?) It would be advantageous to confine this portion of the multiyear projects to coordinate access to classrooms and offices with a single schedule.
 - What are the advantages and disadvantages of phasing? Cost savings and fewer disruptions to contain work to one schedule.
 - Each subproject or phase should be analyzed as if it were a project itself; in c. other words, what are the answers to each question in this template regarding each possible subproject? Subprojects would have similar answers.

OPERATING BUDGET D.

- What are the implications of this project for the current Operating Budget? Reduction of 1. unscheduled maintenance repairs.
- Who will be responsible for this project once it is completed? Facilities Department will be 2. responsible to maintain the installed work.
- Will this project result in an increase? or decrease? In personnel. None. 3.
- What maintenance will this project require when it is completed? an increase? or decrease over the present. Increase in preventative maintenance, reduction in unscheduled repair calls. 4.

ALTERNATIVES E.

- How is the Town getting the function or functions of this project accomplished now? Town lives with less than optimal classroom and office conditions. Requires unscheduled service calls. 1.
- What are the problems with the current method of accomplishing those functions? Reliance on 2. reactive unscheduled maintenance and repairs.
- How was the project proposal determined? Facilities Department review of current conditions. 3.
- What alternatives have not yet been considered? N/A 4.

FUNDING F.

- What source or sources of funding does the sponsor propose, and why? Capital budget. 1.
- Can this project be legally bonded? Yes. 2.
 - If not the whole, what parts?
 - For what term? Ъ.
- Are there revenue sources within this project? No. 3.
 - What are they? a.
 - How much might they yield on an annual basis? b.
 - What would be involved in implementing them? c.
- Are grants or reimbursements available for any part(s) of this project? No. 4.
 - What are they? а
 - How much might be realized from them? Ъ.
 - Who must consent or make the grant? c.
 - What is the time schedule imposed by the grant or reimbursement process? How does that time schedule fit with (what would otherwise be) the construction d. schedule?
 - What other requirements are imposed by the grant or reimbursement process? e.

LOCATION G.

- Has the proposed location for the project been chosen? Yes, but specific rooms to be 1.
- Is the proposed location currently available and in the control of the Town authority or committee 2. who is proposing the project? Yes.
- If not, from whom must the location be acquired or by whom must its use be authorized?
- What is the process for making the location available? How recent is that estimate and how was it 3. 4.
- What issues, besides control and price, if any, does the proposed location present? None. 5.

These questions (and others) may be more for the Committee and Town Officials than for the project sponsors.

CAPITAL PROJECT TEMPLATE FACILITIES DEPARTMENT

Priority: #5: - Refinish Chenery Middle School Gymnasium Floor

THE BASIC PROJECT A.

- What is the project? Refurbishing of painted surface and court lines at large and small gym. 1.
- Where would it be located? (see location G below) Chenery Middle School Gymnasium. 2
- What is the estimated cost? \$67,000.00 3.
 - How recent is the currently available estimate? 2016
 - How was the currently available estimate derived? A site assessment / cost estimate from an industry professional.

PERSONS INVOLVED В.

- Who is the sponsor of the project? Belmont Facilities Department. 1.
- Who, specifically, would supervise the project? Supervisor for Building Maintenance. 2.
- Who would use the completed project? 3.
 - a. By class or group: Students and residents of the Town.
 - Estimated numbers (how estimated.)? 75 to 100 students daily 100 residents during BYBA Basketballs weekly season.
- Who has to agree to authorize the project? Belmont Public Schools / Belmont Facilities 4. Department.
- Who, as a practical matter, has to cooperate to get the project completed? School administration 5. and staff, and Facilities.

TIMING, DELAY AND DENIAL C.

- 1. Is this project ready to be implemented now? Yes
- If not, what remains to be done before the project is undertaken?
- When does the sponsor propose that the project be undertaken, and why? During Schools Summer Break.
- 4. How long will it take to complete the project and what are the important milestones along the way? Approximately 3 to 4 weeks.
- What are the consequences of delay? Denial? (see alternatives below) The School lives with a floor surface that has signs of waring of the finish and faded court lines.
- With what other project or projects should this project be coordinated? N/A
- What is the life expectancy of the project? 10 years
- Can the project be phased or broken into subprojects? \mathbf{No}
 - a. How?
 - What are the advantages and disadvantages of phasing?
 - Each subproject or phase should be analyzed as if it were a project itself; in other words, what are the answers to each question in this template regarding each possible subproject?

OPERATING BUDGET D.

- What are the implications of this project for the current Operating Budget? None
- Who will be responsible for this project once it is completed? Belmont Facilities Department

- 3. Will this project result in an increase or decrease in personnel? No
- 4. What maintenance will this project require when it is completed? an increase? or decrease over the present. Standard procedures for surface cleaning.

E. ALTERNATIVES

- 1. How is the Town getting the function or functions of this project accomplished now? N/A
- 2. What are the problems with the current method of accomplishing those functions? N/A
- 3. How was the project proposal determined? A visual inspection of the current conditions.
- 4. What alternatives have not yet been considered? N/A

F. FUNDING

- 1. What source or sources of funding does the sponsor propose, and why? CBC; Facilities Department cannot fund the project through its operating budget.
- 2. Can this project be legally bonded? Yes
 - a. If not the whole, what parts?
 - b. For what term? Per the discretion of the Treasurer.
- 3. Are there revenue sources within this project? No
- 4.
- a. What are they?
- b. How much might they yield on an annual basis?
- c. What would be involved in implementing them?
- 5. Are grants or reimbursements available for any part(s) of this project? No
 - a. What are they?
 - b. How much might be realized from them?
 - c. Who must consent or make the grant?
 - d. What is the time schedule imposed by the grant or reimbursement process? How does that time schedule fit with (what would otherwise be) the construction schedule?
 - e. What other requirements are imposed by the grant or reimbursement process?

G. LOCATION

- 1. Has the proposed location for the project been chosen? Chenery Middle School.
- 2. Is the proposed location currently available and in the control of the Town authority or committee who is proposing the project? Yes
- 3. If not, from whom must the location be acquired or by whom must its use be authorized?
- 4. What is the process for making the location available? How recent is that estimate and how was it derived? A 2016 site assessment / cost estimate from an industry professional.
- 5. What issues, besides control and price, if any, does the proposed location present? None

These questions (and others) may be more for the Committee and Town Officials than for the project sponsors.

CAPITAL PROJECT REQUEST FACILITIES DEPARTMENT

Priority project #6 - Butler Cafeteria Floor Replacement

A. THE BASIC PROJECT

- 1. What is the project? Replace Cafeteria Floor- Complete Strip and replacement of existing flooring, including asbestos under, and moisture mitigation.
- 2. Where would it be located? (see location G below) Butler Elementary School.
- 3. What is the estimated cost? \$70,000.
 - a. How recent is the currently available estimate? **Original October 2014**, revised 12/16
 - b. How was the currently available estimate derived? Cost estimate from reputable flooring contractor with input from Facilities Department staff.

B. PERSONS INVOLVED

- 1. Who is the sponsor of the project? **Belmont Facilities Department.**
- 2. Who, specifically, would supervise the project? Supervisor of Building Maintenance
- 3. Who would use the completed project? Butler school staff and students.
 - a. By class or group.
 - b. Estimated numbers (how estimated.) -300+ estimated.
- 4. Who has to agree to authorize the project (see funding and location, items F and G below.) Belmont Public Facilities Board.
- 5. Who, as a practical matter, has to cooperate to get the project completed? School staff and Belmont Facilities Department.

C. TIMING, DELAY AND DENIAL

- 1. Is this project ready to be implemented now? No.
- 2. If not, what remains to be done before the project is undertaken? Chapter 149 bid process, approx. 6 weeks
- 3. When does the sponsor propose that the project be undertaken, and why? Summer 2017 as school will be out of session and the building will be empty of staff and students.
- 4. How long will it take to complete the project and what are the important milestones along the way? 4-6 week estimate for work to be completed. Milestones: Project design, public procurement, asbestos abatement, moisture mitigation and application of floor.
- 5. What are the consequences of delay? Denial? (see alternatives below.)- Butler Elementary school lives with a deteriorated floor system until the following summer or until project is approved.
- 6. With what other project or projects should this project be coordinated? N/A
 - a. Why?
 - b. How; precede, simultaneous, succeed?
- 7. What is the life of the project? 30 years.
- 8. Can the project be phased or broken into subprojects? No.
 - a. How? (or why not?) The floor is located in the cafeteria which is used daily throughout the year and cannot be done in stages.
 - b. What are the advantages and disadvantages of phasing? Unable to phase this project.
 - c. Each subproject or phase should be analyzed as if it were a project itself; in other words, what are the answers to each question in this template regarding

each possible subproject? This project can't be phased. Therefore, no subprojects to list.

D. OPERATING BUDGET

- 1. What are the implications of this project for the current Operating Budget? No financial impact to the Belmont School Operations Budget.
- 2. Who will be responsible for this project once it is completed? Belmont Facilities Department.

3. Will this project result in an increase? or decrease? In personnel. – Neither.

4. What maintenance will this project require when it is completed? an increase? or decrease over the present. – Same maintenance practices as currently in place.

E. ALTERNATIVES

- 1. How is the Town getting the function or functions of this project accomplished now? N/A
- 2. What are the problems with the current method of accomplishing those functions? N/A
- 3. How was the project proposal determined? Floor beyond useful life, visual observation of continued deterioration of the condition of the floor.
- 4. What alternatives have not yet been considered? No alternatives applicable.

F. FUNDING

- 1. What source or sources of funding does the sponsor propose, and why? Capital Budget Committee. This is not a recurring maintenance items that is appropriate for operating budget.
- 2. Can this project be legally bonded? Yes.
 - a. If not the whole, what parts?
 - b. For what term?
- 3. Are there revenue sources within this project? No.
 - a. What are they?
 - b. How much might they yield on an annual basis?
 - c. What would be involved in implementing them?
- 4. Are grants or reimbursements available for any part(s) of this project? No
 - a. What are they?
 - b. How much might be realized from them?
 - c. Who must consent or make the grant?
 - d. What is the time schedule imposed by the grant or reimbursement process? How does that time schedule fit with (what would otherwise be) the construction schedule? N/A
 - e. What other requirements are imposed by the grant or reimbursement process?

G. LOCATION

- 1. Has the proposed location for the project been chosen? Yes, Butler School cafeteria.
- 2. Is the proposed location currently available and in the control of the Town authority or committee who is proposing the project? Yes.
- 3. If not, from whom must the location be acquired or by whom must its use be authorized? N/A
- 4. What is the process for making the location available? N/A
- 5. How recent is that estimate and how was it derived? 10/2014 estimate given by reputable flooring contractor, adjusted for inflation.
- What issues, besides control and price, if any, does the proposed location present? Steady deterioration of existing floor system.

These questions (and others) may be more for the Committee and Town Officials than for the project sponsors.

Priority	Project	Requested Amount
1	Town/School Security Upgrades Design (Year 4)	200,000
1	System Wide Building Envelope	200,000
1	Purchase Facilities HVAC Tech van	30,000
1	System Wide Univent Rebuild/Replacement	50,000
2	Chenery - Refinish gym floor	67,000
2	Butler Cafeteria Flooring - Asbestos & moisture mitigation	70,000
	TOTAL OF CAPITAL REQUESTS FY18:	617,000

	Section)
	=	=
	τ	J
(ag	!
	e	
	4)

FACILITIES DEPARTMENT	FY18	<u>FY19</u>	<u>FY20</u>	<u>FY21</u>	<u>FY22</u>	<u>FY23</u>	TOTAL
Town/School Security Upgrades Design (Years 4 - 6)	200,000	200,000	200,000				600,000
System Wide Building Envelope FY15 allowed \$133,070	200,000	200,000	200,000	200,000	200,000		1,000,000
Butler Replace boilers (Year 2 of 2)			50,000				50,000
Butler Replace emergency generator		37,500					37,500
Burbank Replace boilers (Year 2 of 2)			60,000				60,000
Winn Brook Replace master clock system		47,598					47,598
Systemwide univent rebuild/replacement (multiple years)	50,000	50,000	50,000	50,000			200,000
One Ton dump truck to replace Silverado		48,709					48,709
Higginbottom Pool Resurfacing		50,000					50,000
Chenery Middle School Resurface Auditorium Stage		30,000					30,000
Chenery Middle School Stage Equipment Risk Assessment		15,000					15,000
Winn Brook - Replace fire alarm system		158,658					158,658
Burbank - Site redevelopment study		50,000					50,000
Chenery - Upgrade Auditorium Lighting Control System		25,000					25,000
Butler Cafeteria Flooring - Asbestos & moisture mitigation	70,000						70,000
School Parking Lot and Sidewalk Paving Management (Yr 1 of 5)		100,000	100,000	100,000	100,000	100,000	
Lawn Mower for Maintenance Department		15,000					15,000
Chenery - Refinish gym floor	67,000						67,000
Purchase HVAC Technician's van	30,000						30,000
BHS Pool Upgrade with Pool Pak Unit		50,000					50,000
	¢ 617,000	\$ 1.077.46E	\$ 660,000	\$ 350,000	\$ 300,000	\$ 100,000	\$ 3.104.465

School Department FY18 Priority # 1

1. WHAT IS THE PROJECT/ITEM – <u>Purchase of 150 Chromebook devices and 5</u> carts

a. New proposal - New

b. Replacement for something already existing

i. If a replacement, year existing item was purchased.

- ii. If a replacement, plan for existing item (auction, discard, reuse by other person in department, reuse by other department)
- c. Additional enhancement for something existing

REASON FOR THE REQUEST – Provide 150 devices and associated storage carts required for upcoming online testing and to increase classroom technology capacity at Chenery. A recent survey of teaching staff indicated the need for additional resources closer to the classroom, to be used in small groups, and for differentiated instruction. There was a near-universal desire to have those resources in the classroom and accessible on demand. Although each school has access to labs or mobile carts, access to devices is limited.

Teachers cite the need for additional student access in the form of mobile computing devices, the ability for students to use technology in the classroom, devices which allow for greater flexibility in developing curriculum units while saving valuable teaching time by limiting transitions, and honing of students digital and technical literacy skills. In addition, while labs continue to be a valuable resource, Chenery's burgeoning population is simply too large and strains the ability to satisfy the increasing need for computer based curriculum and learning.

Furthermore, staff this year have indicated having multiple sets of mobile devices has already provided an improvement in technology access, but there is still a significant need for additional devices available on the classroom or team level.

1. COST \$39,960.00

a. How was cost arrived at? (State Bid list, actual bid, professional cost estimate, based on past experience, wild guess) – State contract vendor price.

b. How recent is the estimate? (if older than a couple of years, you will be asked to refine or confirm it as current and that process could jeopardize the potential for getting on the list) – <u>January 2017</u>

c. What effect will this have on future operating budgets?

i. Will there be an increase/decrease in staffing as a result of this? No change in staffing

ii. Will operating costs increase/decrease? Please be specific. Should be a small increase to cover repairs in future years.

iii. Is there a need for training due to the purchase of this item? If so, have you included that in your operating budget? No outside training costs.

- iv. Is there a need for the purchase of licenses to use the equipment? If so, has that been included in your operating budget? One time license per device is included in the total cost.
- v. Are there ongoing maintenance contracts required for this item? If so, has that been included in your operating budget? No maintenance contracts involved.

2. TIMING OF PROJECT

- a. What else might need to be done in order to implement the project for the coming fiscal year? No other work needs to be done other than configuring the devices.
- b. Do you need approvals from any other group (Planning Board, Historic District Commission, Conservation Commission etc). No.
 - i. If yes, when do you plan to do that?
- c. How long will it take to complete the project? 2-3 weeks
- d. Can the project be phased? No. This is the number of devices needed for Spring 2018 testing.
 - i. If so, please address the advantages and disadvantages
 - ii. If this is an ongoing phased project, please include in the title the year we are in (for example, with Kal Wal at BHS, "year 4 of a 5 year plan" or whatever is appropriate).
- e. Does the project need to be bid? No. State contract pricing.
 - i. If so, have the bid specs been written? When do you plan to bid this?

3. LIFE EXPECTANCY OF THIS ITEM/PROJECT

a. Is this a one time purchase, or will it need to be replaced in the future?

<u>Devices have an expected lifespan of about 5-6 years and may need to be replaced at that time.</u>

4. FUNDING

- a. Can this be legally bonded?
- b. Are there any grants or reimbursements available for this purchase? None
- c. If this is a replacement, how was the existing item funded (CBC, grant, donation, operating funds, other?)

School Department FY18 Priority # 2

1. WHAT IS THE PROJECT/ITEM – <u>Upgrade of Chenery Middle School Network</u> Wiring

a. New proposal

- b. Replacement for something already existing -YES
 - i. If a replacement, year existing item was purchased. 1997-2000
 - ii. If a replacement, plan for existing item (auction, discard, reuse by other person in department, reuse by other department) <u>Discard</u>
- c. Additional enhancement for something existing
- 2. REASON FOR THE REQUEST The existing wiring is nearly 20 years old and is rated primarily Category 5. This cabling rating has a maximum throughput of 100 mb/sec. which is insufficient for many educational applications and is becoming a bottleneck for network traffic. Some classroom connections are also becoming brittle and showing signs of oxidation; which inhibits network speeds and reliability.
- 3. COST \$65,500
 - a. How was cost arrived at? (State Bid list, actual bid, professional cost estimate, based on past experience, wild guess) Confirmed price submitted by a state contract vendor.
 - b. How recent is the estimate? (if older than a couple of years, you will be asked to refine or confirm it as current and that process could jeopardize the potential for getting on the list) February 2017

c. What effect will this have on future operating budgets?

- i. Will there be an increase/decrease in staffing as a result of this? No increase in staffing.
- ii. Will operating costs increase/decrease? Please be specific. Will result in a decrease in wiring maintenance and network troubleshooting by outside contractors.
- iii. Is there a need for training due to the purchase of this item? If so, have you included that in your operating budget? No training needed.
- iv. Is there a need for the purchase of licenses to use the equipment? If so, has that been included in your operating budget? No licenses required.
- v. Are there ongoing maintenance contracts required for this item? If so, has that been included in your operating budget? No ongoing maintenance contracts required.
- 4. TIMING OF PROJECT

a. What else might need to be done in order to implement the project for the coming fiscal year? This is a self-contained project which does not require additional prep work.

b. Do you need approvals from any other group (Planning Board, Historic District Commission, Conservation Commission etc). No.

i. If yes, when do you plan to do that?

c. How long will it take to complete the project? Approximately 4-5 weeks.

d. Can the project be phased? —Yes.

If so, please address the advantages and disadvantages — If phased, it will delay segments of classrooms from benefitting from the increased network capacity. There is also no guarantee that E-Rate reimbursements will be available in future years. If the scope of work is changed, we will be required to solicit a new round of pricing which may result in us missing the E-Rate filing deadline.

We had hoped to take advantage of working during the summer. Otherwise, each phase will need to be scheduled during subsequent school vacation periods.

If this is an ongoing phased project, please include in the title the year we are in (for example, with Kal Wal at BHS, "year 4 of a 5 year plan" or whatever is appropriate).

- e. Does the project need to be bid? <u>No. Pricing is from an approved state</u> contract vendor. There was, however, a Request for Pricing issued to those state contract vendors and is the basis for pricing and vendor selection.
 - i. If so, have the bid specs been written? When do you plan to bid this?

5. LIFE EXPECTANCY OF THIS ITEM/PROJECT

a. Is this a one time purchase, or will it need to be replaced in the future? $-\underline{It}$ is uncertain as to when another retrofit would need to occur, if at all.

6 FUNDING

- a. Can this be legally bonded? Note sure.
- b. Are there any grants or reimbursements available for this purchase? We will seek 40% reimbursement under the federal e-Rate program.
- c. If this is a replacement, how was the existing item funded (CBC, grant, donation, operating funds, other?) <u>Building Committee</u>



MEMO

MEMO TO:

David J. Kale, Town Administrator

FROM:

Glenn R. Clancy, P.E., Director

SUBJECT:

FY 18 Capital Request - Burbank School Pedestrian/Traffic

Improvements

DATE:

February 2, 2017

I am requesting \$38,000 for pedestrian safety upgrades at the Burbank School.

The proposal includes the installation of granite curbing and a new concrete sidewalk on both sides of School Street, near the Burbank School, from Temple Street to the driveway at #259 School Street (see attached plan). I believe curbing will protect pedestrians and slow down traffic. New concrete sidewalks are a necessary upgrade.

Also included in the proposal is the cost to purchase a pair of pedestrian school crossing flashing LED signs (specifications attached). These signs will be push button activated and will be placed at the existing crosswalk in front of the Burbank School.

CBC REQUEST TEMPLATE INSTRUCTIONS FOR FY 2018

1. WHAT IS THE PROJECT/ITEM

- a. New proposal Install curbing, concrete sidewalk and LED pedestrian signs on School Street at the Burbank School \$38,000
- b. Replacement for something already existing No
 - i. If a replacement, year existing item was purchased.
 - ii. If a replacement, plan for existing item (auction, discard, reuse by other person in department, reuse by other department)
- c. Additional enhancement for something existing Yes

2. REASON FOR THE REQUEST

3. COST

- a. How was cost arrived at? (State Bid list, actual bid, professional cost estimate, based on past experience, wild guess) Recent bid prices
- b. How recent is the estimate? (if older than a couple of years, you will be asked to refine or confirm it as current and that process could jeopardize the potential for getting on the list) 2/1/2017
- c. What effect will this have on future operating budgets?
 - i. Will there be an increase/decrease in staffing as a result of this? No
 - ii. Will operating costs increase/decrease? Please be specific. No
 - iii. Is there a need for training due to the purchase of this item? If so, have you included that in your operating budget? No
 - iv. Is there a need for the purchase of licenses to use the equipment? No If so, has that been included in your operating budget?
 - v. Are there ongoing maintenance contracts required for this item? If so, has that been included in your operating budget? No.

4. TIMING OF PROJECT

- a. What else might need to be done in order to implement the project for the coming fiscal year? all is clear for propsoed work.
- b. Do you need approvals from any other group (Planning Board, Historic District Commission, Conservation Commission etc). No
 - i. If yes, when do you plan to do that?
- c. How long will it take to complete the project? 1 month
- d. Can the project be phased? No
 - i. If so, please address the advantages and disadvantages
 - ii. If this is an ongoing phased project, please include in the title the year we are in (for example, with Kal Wal at BHS, "year 4 of a 5 year plan" or whatever is appropriate).
- e. Does the project need to be bid? Yes
 - i. If so, have the bid specs been written? When do you plan to bid this? Specifications are being developed, project will be included in annual pavement management project. Bidding will occur in the spring.

5. LIFE EXPECTANCY OF THIS ITEM/PROJECT

a. Is this a one time purchase, or will it need to be replaced in the future? Sidewalk and curbing have an approx. 40-50 years. Pedestrian signs approx. 10 years.

6. FUNDING

- a. Can this be legally bonded? No
- b. Are there any grants or reimbursements available for this purchase? No
- c. If this is a replacement, how was the existing item funded (CBC, grant, donation, operating funds, other?)



MEMO

мемо то:

David J. Kale, Town Administrator

FROM:

Glenn R. Clancy, P.E., Director

SUBJECT:

FY 18 Capital Request – Pavement Management Program

DATE:

January 9, 2017

I am requesting \$1,642,000 for Pavement Management Program funding in FY 18. This amount includes funds from override votes held in 2001and 2015 (increased 2.5% annually).

Funding for road projects is a combination of Pavement Management funds and CH 90 funds. In FY 18 the following roads are tentatively programmed:

Name	From	То	PCI
WILLISTON RD	TRAPELO RD	HORNE RD	34
ALMA AVE	BARTLETT AVE	BELMONT ST	38
LOUISE RD	EDGEMOOR RD	BECKET RD	38
NEWTON ST	BELMONT ST	FAIRVIEW AVE	38
	BELMONT ST	WHITE ST	38
RIDGE RD	WASHINGTON ST	CHESTER RD	39
CARLETON RD	SOMERSET ST	FLETCHER RD	39
JUNIPER RD BRANCHAUD RD	CARLETON RD	WASHINGTON ST	40
	SLADE ST	HAMMOND RD	40
CREELEY RD	BARTLETT AVE	BELMONT ST	40
HARRIET AVE	PAYSON RD	OAKLEY RD	51
BENTON RD	OAKLEY RD	PAYSON RD	49
LAWNDALE ST	PAYSON RD (N)	PAYSON RD (S)	51
TOWNSEND RD	• •	BELMONT ST	48
PAYSON RD	OAKLEY RD	DELINOW 31	

All roads proposed for reconstruction in FY 18 are also included in the DPW-Water capital program. I also intend to use a portion of the FY 18 funds to design improvements to the intersections of Concord Avenue at Mill Street and Winter Street. I will be working with the Traffic Advisory Committee on that process.

CBC REQUEST TEMPLATE INSTRUCTIONS FOR FY 2018

1. WHAT IS THE PROJECT/ITEM

- a. New proposal Pavement Management \$1,642,000 and \$535,089 Chapter 90 Funds.
- b. Replacement for something already existing No
 - i. If a replacement, year existing item was purchased.
 - ii. If a replacement, plan for existing item (auction, discard, reuse by other person in department, reuse by other department)
- c. Additional enhancement for something existing Yes

2. REASON FOR THE REQUEST

3. COST

- a. How was cost arrived at? (State Bid list, actual bid, professional cost estimate, based on past experience, wild guess) Recent bid prices
- b. How recent is the estimate? (if older than a couple of years, you will be asked to refine or confirm it as current and that process could jeopardize the potential for getting on the list) 12/5/2016
- e. What effect will this have on future operating budgets?
 - i. Will there be an increase/decrease in staffing as a result of this? No
 - ii. Will operating costs increase/decrease? Please be specific. No
 - iii. Is there a need for training due to the purchase of this item? If so, have you included that in your operating budget? No
 - iv. Is there a need for the purchase of licenses to use the equipment? No If so, has that been included in your operating budget?
 - v. Are there ongoing maintenance contracts required for this item? If so, has that been included in your operating budget? Routine crackseal and patching (this is funded through this same CBC request and is performed on previously repaired roads).

4. TIMING OF PROJECT

- a. What else might need to be done in order to implement the project for the coming fiscal year? DPW Water main replacement. Capital sewer and drain repair Sewer Enterprise Fund.
- b. Do you need approvals from any other group (Planning Board, Historic District Commission, Conservation Commission etc). No
 - i. If yes, when do you plan to do that?
- c. How long will it take to complete the project? 9-12 months
- d. Can the project be phased? No
 - i. If so, please address the advantages and disadvantages
 - ii. If this is an ongoing phased project, please include in the title the year we are in (for example, with Kal Wal at BHS, "year 4 of a 5 year plan" or whatever is appropriate).
- e. Does the project need to be bid? Yes

i. If so, have the bid specs been written? When do you plan to bid this? Specs are being developed, bidding will occur in the spring.

5. LIFE EXPECTANCY OF THIS ITEM/PROJECT

a. Is this a one time purchase, or will it need to be replaced in the future? Resurfacing will be required in 20-25 years

6. FUNDING

- a. Can this be legally bonded? Yes
- b. Are there any grants or reimbursements available for this purchase? Yes, Ch 90 state aid.
- c. If this is a replacement, how was the existing item funded (CBC, grant, donation, operating funds, other?)



MEMO

MEMO TO:

David J. Kale, Town Administrator

FROM:

Glenn R. Clancy, P.E., Director

SUBJECT:

FY 18 Capital Request – Sewer and Drain Repair

DATE:

January 9, 2017

I am requesting \$500,000 for Sewer and Drain Repair funding in FY 17. This money would come from the Sewer Enterprise Fund. In FY 17 town wide storm drain water quality testing was done to determine whether sanitary sewage is present in the system. Sampling was done in cooperation with EPA. The sampling identified areas where illicit discharges are impacting stormwater quality. Funding from the Sewer Enterprise Fund will help us identify the sources of the pollution and develop a mitigation plan.

In FY 18 \$280,000 is earmarked for repairs to sewers and storm drains on roads to be reconstructed under the Pavement Management Program. Often these repairs are limited in nature and allow for required major work (typically, relining of mains) to be deferred until more funding becomes available.

CBC REQUEST TEMPLATE INSTRUCTIONS FOR FY 2018

1. WHAT IS THE PROJECT/ITEM

- a. New proposal Sewer and Drain Investigation, Evaluation and Repair -\$500,000.
- b. Replacement for something already existing No
 - i. If a replacement, year existing item was purchased.
 - ii. If a replacement, plan for existing item (auction, discard, reuse by other person in department, reuse by other department)
- c. Additional enhancement for something existing Yes

2. REASON FOR THE REQUEST

3. COST

- a. How was cost arrived at? (State Bid list, actual bid, professional cost estimate, based on past experience, wild guess) Best guess from consultants and past experience
- b. How recent is the estimate? (if older than a couple of years, you will be asked to refine or confirm it as current and that process could jeopardize the potential for getting on the list) 1/9/2017
- c. What effect will this have on future operating budgets?
 - i. Will there be an increase/decrease in staffing as a result of this? No
 - ii. Will operating costs increase/decrease? Please be specific. No
 - iii. Is there a need for training due to the purchase of this item? If so, have you included that in your operating budget? No
 - iv. Is there a need for the purchase of licenses to use the equipment? No If so, has that been included in your operating budget?
 - v. Are there ongoing maintenance contracts required for this item? If so, has that been included in your operating budget? Routine maintenance already being done by DPW as necessary/required.

4. TIMING OF PROJECT

- a. What else might need to be done in order to implement the project for the coming fiscal year? N/A
- b. Do you need approvals from any other group (Planning Board, Historic District Commission, Conservation Commission etc). No
 - i. If yes, when do you plan to do that?
- c. How long will it take to complete the project? Minimum 1 year
- d. Can the project be phased? My budget has already taken phasing into account in subsequent years. Please see five year plan.
 - i. If so, please address the advantages and disadvantages Advantage Spreads out cost. Disadvantage delays repairs.
 - ii. If this is an ongoing phased project, please include in the title the year we are in (for example, with Kal Wal at BHS, "year 4 of a 5 year plan" or whatever is appropriate).
- e. Does the project need to be bid? Yes

i. If so, have the bid specs been written? When do you plan to bid this? Investigation and analysis needs to be completed before a project can be scoped.

5. LIFE EXPECTANCY OF THIS ITEM/PROJECT

a. Is this a one time purchase, or will it need to be replaced in the future? 75 - 100 years

6. FUNDING

- a. Can this be legally bonded? Yes
- b. Are there any grants or reimbursements available for this purchase? No
- c. If this is a replacement, how was the existing item funded (CBC, grant, donation, operating funds, other?)



MEMO

MEMO TO:

David J. Kale, Town Administrator

FROM:

Glenn R. Clancy, P.E., Director

SUBJECT:

Five-Year Capital Request

DATE:

January 9, 2017

The Office of Community Development five year capital budget projection includes funding for the Pavement Management Program, sewer and storm drain work and provisions for debt service repayment through the Sewer Enterprise Fund.

Funding for the Pavement Management Program comes from an override vote held in 2001 and 2015. The amount is increased by 2.5% annually and is added to the annual CH 90 allotment, assumed to be the current amount of \$535, 089.

Sewer and drain funding comes from the Sewer Enterprise Fund. It is anticipated that \$500,000 for capital projects will be available in FY 18. In FY 17 town wide storm drain water quality testing was done to determine whether sanitary sewage is present in the system. This sampling was done in cooperation with EPA. The sampling identified areas where illicit discharges are impacting stormwater quality. Funding from the Sewer Enterprise Fund will help us identify the sources of the pollution and develop a mitigation plan.

A new municipal stormwater permit will become effective July 1, 2017. This permit includes many conditions the Town must meet. We are still evaluating the budget impacts of this permit. At this time it appears some of the work can be done in house and there will certainly be items that require the assistance of an outside consultant.

In FY 18 \$260,000 is earmarked for repairs to sewers and storm drains on roads to be reconstructed under the Pavement Management Program. Often these repairs are limited in nature and allow for required major work (typically, relining of mains) to be deferred until more funding becomes available.

Debt service for sewer and drain loans is paid through the Sewer Enterprise Fund. We work closely with the Town Treasurer and the Department of Public Works to make sure we budget the proper amount. This is an annual item.

Office of Community Development 5 Year Capital Budget Projection

process of the second s	Eunging Source	FY 18	FY 19	FY 20	FY 21	FY 22	FY 23
Roads/Pavement Management							
Annual Appropriation:	Capital Budget 2001	\$1,326,812	\$1,359,982	\$1,393,982	\$1,428,831	\$1,464,552	\$1,501,166
7 (madi / (ppropriation)	Capital Budget 2015	\$315,188	\$323,068	\$331,144	\$339,423	\$347,909	\$356,606
	Ch 90	\$535,089	\$535,089	\$535,089	\$535,089	\$535,089	\$535,089
	0.1.00	,					
Sub-Total - Roads/Pavement Management		\$2,177,089	\$2,218,139	\$2,260,215	\$2,303,343	\$2,347,550	\$2,392,861
Sewer Repair/Testing (EPA)	Sewer Enterprise Fund - Capital	7=1,1===			1		
Sampling and Analysis	Control Emorphise Faria Capital	\$40,000	\$70,000	\$70,000	\$50,000	\$50,000	\$50,000
Design/Engineering		\$50,000	\$50,000	\$50,000	-	-	-
Construction		-	-	-	-	-	-
Constituction							
Sub-Total		\$90,000	\$120,000	\$120,000	\$50,000	\$50,000	\$50,000
I/I Mitigation (MWRA)	Sewer Enterprise Fund - Capital						
Design/Engineering		\$100,000	\$25,000	-	\$70,000	\$25,000	-
Construction		-	-	-	-	-	
- Contradion							
Sub-Total		\$100,000	\$25,000	\$0	\$70,000	\$25,000	\$0
MS4 Permit (NPDES)	Sewer Enterprise Fund - Capital						
Permit Compliance		\$30,000	\$75,000	\$100,000	\$100,000	\$100,000	\$100,000
1 omit compliance							
Sub-Total		\$30,000	\$75,000	\$100,000	\$100,000	\$100,000	\$100,000
Pavement Management Roadways	Sewer Enterprise Fund - Capital						
Sewer and Drain CCTV and Design Report		\$80,000	\$80,000	\$80,000	\$80,000	\$80,000	\$80,000
Sewer and Drain Relining and Point Repairs		\$200,000	\$200,000	\$200,000	\$200,000	\$200,000	\$200,000
CONTRACT TO THE STATE OF THE ST							
Sub-Total Sub-Total		\$280,000	\$280,000	\$280,000	\$280,000	\$280,000	\$280,000
Sub-Total - Sewer Repair/Testing		\$500,000	\$500,000	\$500,000	\$500,000	\$455,000	\$430,000
Loan Repayments (Debt Service)	Sewer Enterprise Fund - Operating						
Sewer Bond - FY 06		\$170,427	\$161,377	\$157,477	\$153,577	\$149,677	\$140,777
DEP CWSRF pt 1		\$446,172	\$445,665	\$445,148	\$444,620	\$444,081	\$443,532
DEP CWSRF pt 2		\$97,171	\$97,171	\$97,171	\$97,171	\$97,171	\$97,171
CWSRF (2012)		\$142,531	\$142,554	\$142,577	\$142,601	\$142,625	\$142,650
Future Borrowing (DEP)			\$175,000	\$175,000	\$175,000	\$175,000	\$175,000
Sub-Total - Debt Service Sewer Ent		\$856,301	\$1,021,766	\$1,017,373	\$1,012,970	\$1,008,554	\$999,130
Grand Total		\$3,533,390	\$3,739,905	\$3,777,589	\$3,816,313	\$3,811,104	\$3,821,991
1 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2							
Funding Sources - Summary					-		
Capital Pavement Management		\$1,642,000	\$1,683,050	\$1,725,126	\$1,768,254	\$1,812,461	\$1,857,772
Chapter 90 (estimate)		\$535,089	\$535,089	\$535,089	\$535,089	\$535,089	\$535,089
Sewer Enterprise - Capital		\$500,000	\$500,000	\$500,000	\$500,000	\$455,000	\$430,000
Sewer Enterprise - Operating		\$856,301	\$1,021,766	\$1,017,373	\$1,012,970	\$1,008,554	\$999,130
Grand Total	T	\$3,533,390	\$3,739,905	\$3,777,589	\$3,816,313	\$3,811,104	\$3,821,991