

## Water Resource Operations & Hydrology East Anglia Area - Essex, Norfolk & Suffolk



### Surface Water Hydrological Summary for April 2018



Data presented within this document are primarily intended for internal use and might not be **validated**. This document should only be used for information and no inference should be drawn without consultation with the Environment Agency.

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## Site Information & Summary for April 2018

River	Station Name	County/Location	Station No.	N.G.R.	Catchment Area (km <sup>2</sup> )	April 2018 Mean Flow (m <sup>3</sup> /sec)	L.T. Mean for Current Month (m <sup>3</sup> /sec)	L.T. Minima for Current Month (m <sup>3</sup> /sec)	Long Term Q95 (m <sup>3</sup> /sec)
Burn	Burnham Overy	North Norfolk	34012	TF 842 428	80	0.563	0.429	0.103	0.098
Stiffkey	Warham	North Norfolk	34018	TF 944 414	87.8	1.525	0.622	0.284	0.136
Bure	Ingworth	North Norfolk	34003	TG 192 296	164.7	1.783	1.226	0.667	0.576
Wensum	Fakenham	North West Norfolk	34011	TF 919 294	161.9	1.766	1.042	0.364	0.235
Ant	Honing Lock	North Norfolk	34008	TG 331 270	49.3	0.495	0.361	0.231	0.179
Wensum	Swanton Morley	Mid Norfolk	34014	TG 020 184	397.8	6.598	3.057	1.360	0.939
Tud	Costessey Park	Mid Norfolk	34005	TG 170 113	73.2	0.860	0.397	0.150	0.095
Yare	Colney	South Norfolk	34001	TG 182 082	231.8	4.448	1.615	0.514	0.325
Tas	Shotesham	South Norfolk	34002	TM 226 994	146.5	1.697	0.750	0.106	0.175
Waveney	Needham	North Suffolk	34006	TM 229 811	370	4.696	1.628	0.390	0.281
Blyth	Holton	East Suffolk	35013	TM 406 769	92.9	2.351	0.455	0.090	0.066
Alde	Farnham	East Suffolk	35003	TM360 601	63.9	1.034	0.294	0.055	0.043
Ore	Beversham	East Suffolk	35004	TM 359 583	54.9	0.515	0.284	0.079	0.069
Deben	Naunton Hall	East Suffolk	35002	TM 322 534	163.1	2.528	0.730	0.161	0.084
Gipping	Bramford	South Suffolk	35010	TM 127 465	298	2.270	1.287	0.280	0.191
Black Ditch	Hollesley	South East Suffolk	35026	TM 354 440	11.2	0.066	0.074	0.051	0.046
Box	Polstead	South Suffolk	36003	TM 032 354	53.9	0.438	0.239	0.074	0.062
Stour	Westmill	North Essex	36008	TL 827 463	224.5	2.963	1.172	0.195	0.148
Colne	Lexden	Mid Essex	37005	TL 962 261	238.2	2.149	1.130	0.318	0.203
Chelmer	Churchend	Mid Essex	37011	TL 629 233	72.6	0.724	0.382	0.075	0.052
Brain	Guithavon	Mid Essex	37009	TL 845 158	60.7	0.652	0.408	0.172	0.156
Blackwater	Appleford	Mid Essex	37010	TL 818 147	247.3	2.385	1.226	0.184	0.314
Can	Beaches Mill	Mid Essex	37006	TL 690 072	228.4	2.620	1.315	0.250	0.191
Chelmer	Springfield	Mid Essex	37008	TL 713 071	190.3	1.904	1.087	0.322	0.284
Crouch	Wickford	South Essex	37031	TQ 748 934	71.8	0.720	0.333	0.067	0.044

### TBRs for rainfall reporting

<b>Norfolk</b>	Fakenham	TF 91982 28847	<b>Suffolk</b>	Eye	TM 151 723	<b>Essex</b>	Kirtling Green	TL 67961 55819
	North Elmham	TF 99876 21284		Benhall	TM 38162 60613		Maldon	TL 88950 07450
	Salle	TG 126 244		Earl Soham	TM 233 628		Gt Sampford	TL 645 351
	Hethersett	TG 1475 0525		Chantry	TM 14900 41400		Gt Oakley	TM 2105 2715
	Morley St Botolph	TM 0565 9945		Worlingham	TM 453 895		Rayleigh	TQ 8280 9050
	North Walsham	TG 296 307						

# East Anglia Area - Essex, Norfolk & Suffolk River Flow Summary

## Current Month

River	Station	April 2018
Burn	Burnham Overy	Above Normal
Stiffkey	Warham	Exceptionally High
Bure	Ingworth	Notably High
Wensum	Fakenham	Notably High
Ant	Honing Lock	Notably High
Wensum	Swanton Morley	Exceptionally High
Tud	Costesey Park	Notably High
Yare	Colney	Exceptionally High
Tas	Shotesham	Exceptionally High
Waveney	Needham	Notably High
Blyth	Holton	Exceptionally High
Alde	Farnham	Exceptionally High
Ore	Beversham	Notably High
Deben	Naunton Hall	Exceptionally High
Gipping	Bramford	Above Normal
Black Ditch	Hollesley	Below Normal
Box	Polstead	Notably High
Stour	Westmill	Notably High
Colne	Lexden	Notably High
Chelmer	Churchend	Notably High
Brain	Guithavon	Notably High
Blackwater	Appleford	Notably High
Can	Beaches Mill	Notably High
Chelmer	Springfield	Notably High
Crouch	Wickford	Notably High

## Previous 11 Months

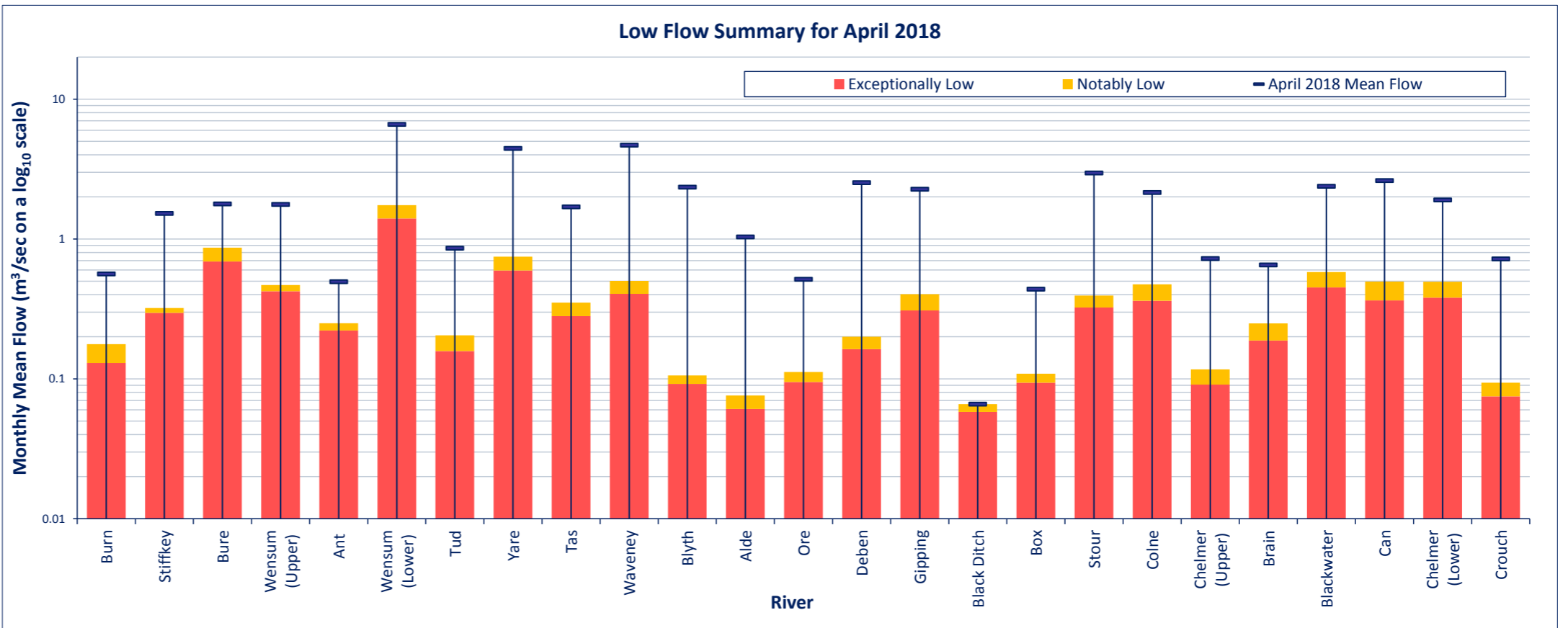
	March 2018	February 2018	January 2018	December 2017	November 2017	October 2017	September 2017	August 2017	July 2017	June 2017	May 2017
Normal	Normal	Normal	Normal	Normal	Below Normal	Normal	Normal	Normal	Below Normal	Below Normal	Normal
Above Normal	Above Normal	Normal	Normal	Normal	Notably Low	Below Normal	Normal	Normal	Normal	Below Normal	Normal
Above Normal	Above Normal	Above Normal	Normal	Above Normal	Notably Low	Notably Low	Normal	Normal	Normal	Below Normal	Below Normal
Normal	Normal	Normal	Normal	Normal	Below Normal	Below Normal	Normal	Normal	Normal	Normal	Below Normal
Above Normal	Normal	Normal	Normal	Normal	Below Normal	Below Normal	Normal	Normal	Normal	Normal	Normal
Above Normal	Above Normal	Above Normal	Above Normal	Notably High	Below Normal	Below Normal	Normal	Normal	Normal	Below Normal	Below Normal
Above Normal	Above Normal	Normal	Normal	Notably High	Below Normal	Normal	Normal	Normal	Normal	Normal	Below Normal
Exceptionally High	Above Normal	Notably High	Notably High	Exceptionally High	Below Normal	Normal	Above Normal	Above Normal	Normal	Normal	Below Normal
Notably High	Normal	Normal	Normal	Above Normal	Notably Low	Notably Low	Normal	Normal	Below Normal	Below Normal	Below Normal
Above Normal	Normal	Normal	Normal	Normal	Exceptionally Low	Exceptionally Low	Normal	Normal	Below Normal	Notably Low	Normal
Exceptionally High	Normal	Normal	Normal	Notably High	Notably Low	Notably Low	Normal	Above Normal	Normal	Normal	Normal
Exceptionally High	Normal	Normal	Normal	Normal	Notably Low	Below Normal	Below Normal	Normal	Below Normal	Below Normal	Normal
Notably High	Normal	Normal	Normal	Normal	Exceptionally Low	Notably Low	Below Normal	Normal	Below Normal	Below Normal	Normal
Exceptionally High	Notably High	Notably High	Notably High	Normal	Exceptionally Low	Notably Low	Below Normal	Normal	Normal	Below Normal	Normal
Above Normal	Normal	Normal	Normal	Normal	Exceptionally Low	Notably Low	Normal	Normal	Below Normal	Below Normal	Normal
Notably Low	Exceptionally Low	Exceptionally Low	Exceptionally Low	Exceptionally Low	Exceptionally Low	Exceptionally Low	Notably Low	Notably Low	Below Normal	Exceptionally Low	Exceptionally Low
Notably High	Normal	Normal	Normal	Normal	Exceptionally Low	Exceptionally Low	Notably Low	Normal	Below Normal	Below Normal	Normal
Above Normal	Normal	Normal	Normal	Normal	Normal	Above Normal	Exceptionally High	Above Normal	Notably High	Normal	Above Normal
Notably High	Normal	Normal	Normal	Normal	Notably Low	Notably Low	Below Normal	Normal	Normal	Below Normal	Normal
Above Normal	Normal	Normal	Normal	Normal	Notably Low	Below Normal	Normal	Above Normal	Below Normal	Normal	Normal
Above Normal	Normal	Normal	Normal	Normal	Below Normal	Below Normal	Normal	Above Normal	Notably High	Normal	Normal
Notably High	Normal	Normal	Normal	Normal	Normal	Normal	Normal	Normal	Notably High	Normal	Above Normal
Notably High	Normal	Normal	Normal	Above Normal	Notably Low	Below Normal	Above Normal	Exceptionally High	Notably High	Normal	Normal
Above Normal	Normal	Normal	Normal	Normal	Exceptionally Low	Notably Low	Normal	Above Normal	Normal	Normal	Normal
Notably High	Normal	Normal	Normal	Normal	Exceptionally Low	Below Normal	Notably High	Exceptionally High	Above Normal	Normal	Above Normal

Colour	County
Light Green	Norfolk
Light Grey	Suffolk
Light Blue	Essex

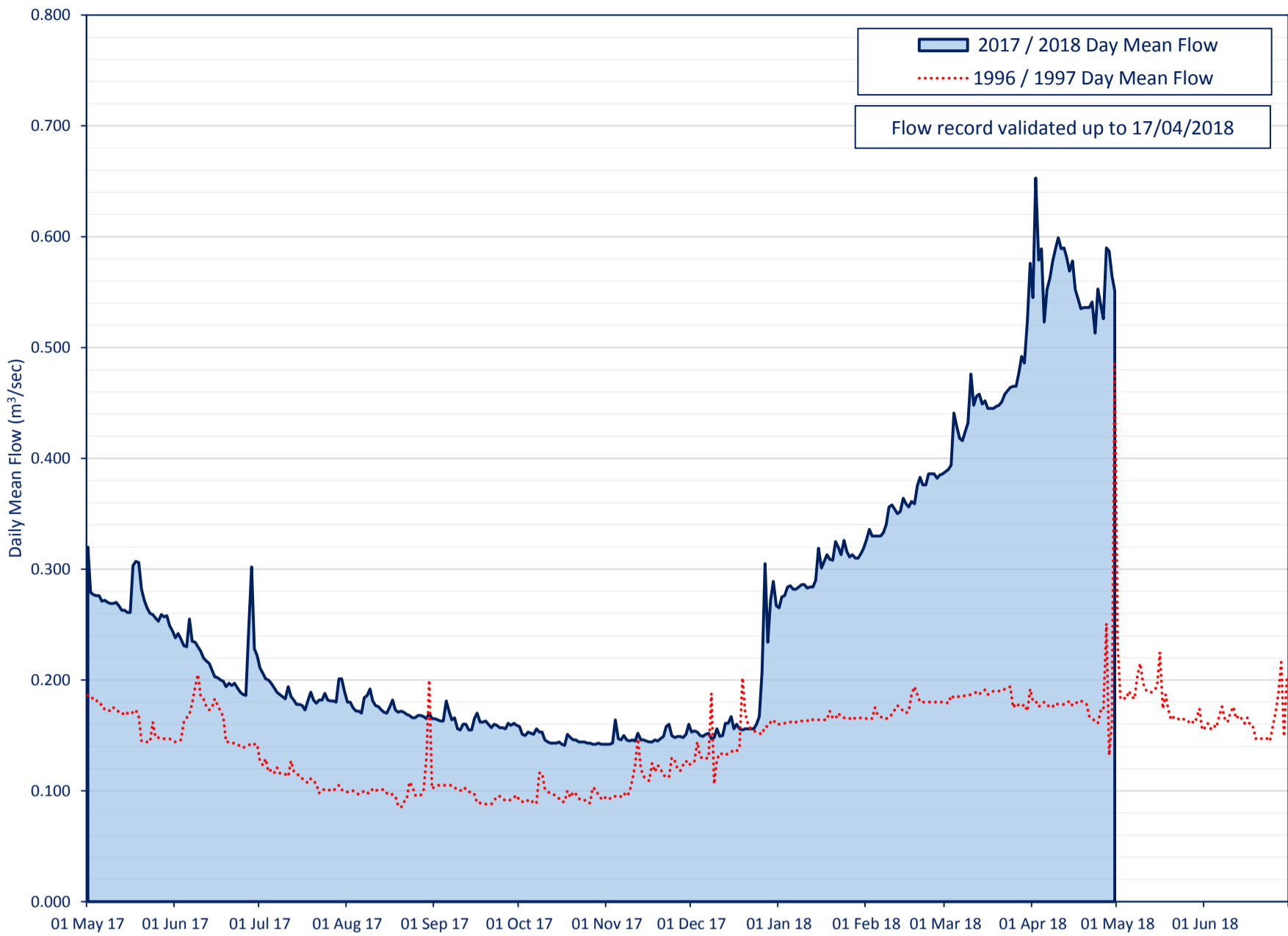
Category Key	Probability of occurrence	Return period (approx.)
Exceptionally Low	0.05 (5%)	> 1 in 20
Notably Low	0.08 (8%)	> 1 in 8 to 1 in 20
Below Normal	0.15 (15%)	> 1 in 4 to 1 in 8
Normal	0.44 (44%)	< 1 in 4
Above Normal	0.15 (15%)	> 1 in 4 to 1 in 8
Notably High	0.08 (8%)	> 1 in 8 to 1 in 20
Exceptionally High	0.05 (5%)	> 1 in 20

### Number of sites below indicative low flow triggers

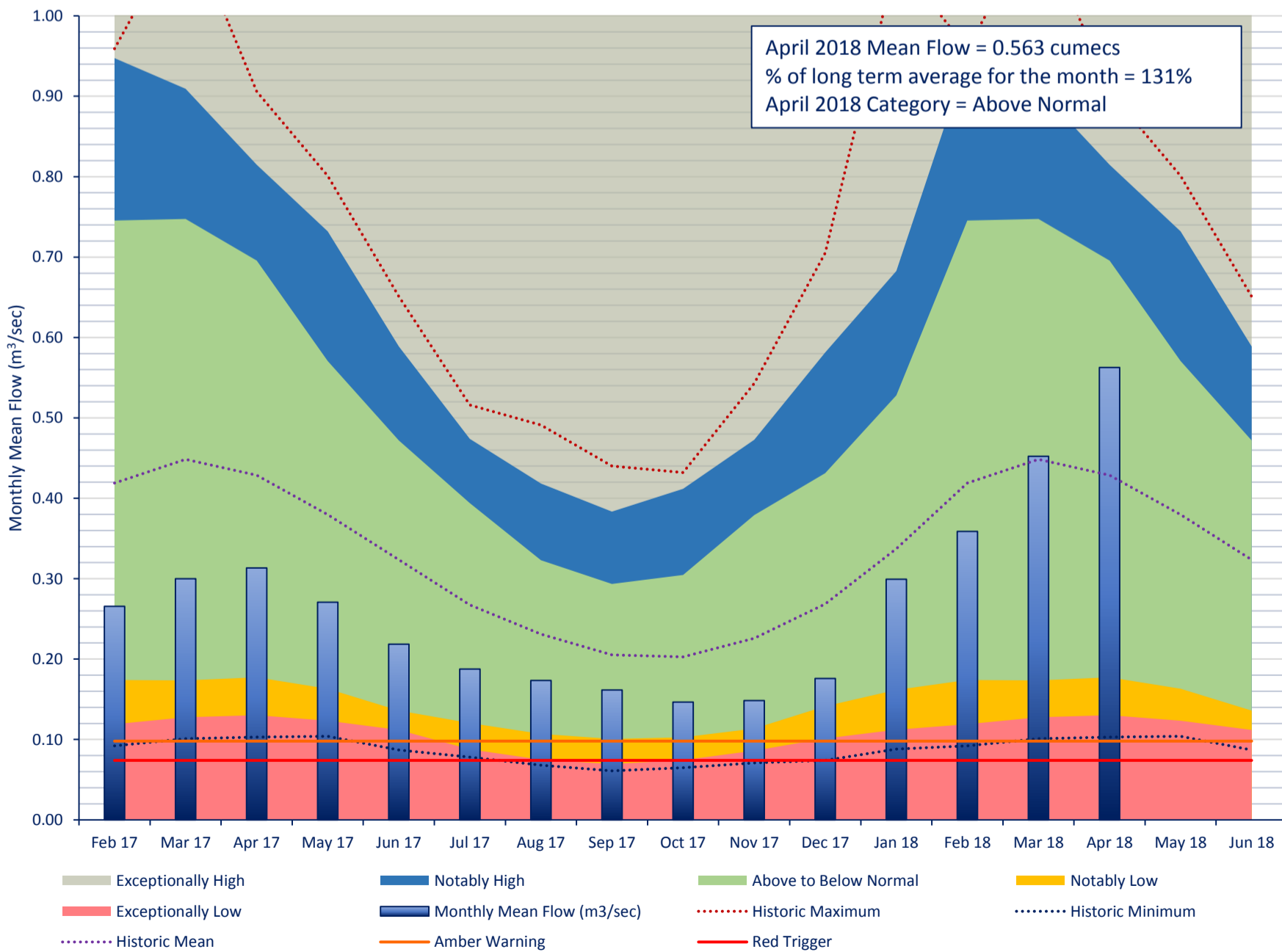
County	Amber Warning	Red Trigger
Norfolk	0	0
Suffolk	0	0
Essex	0	0



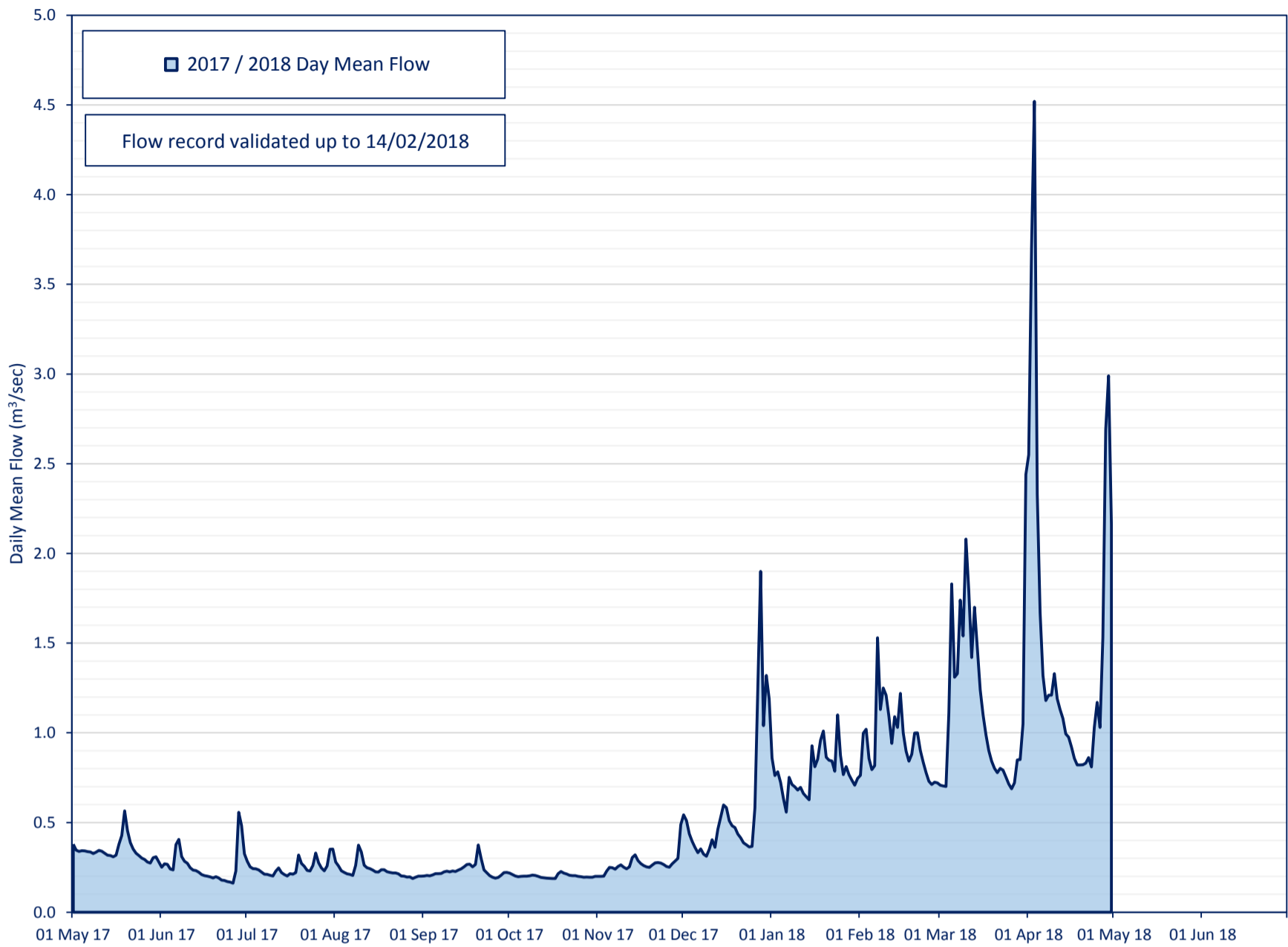
River Burn at Burnham (12 Month Hydrograph)



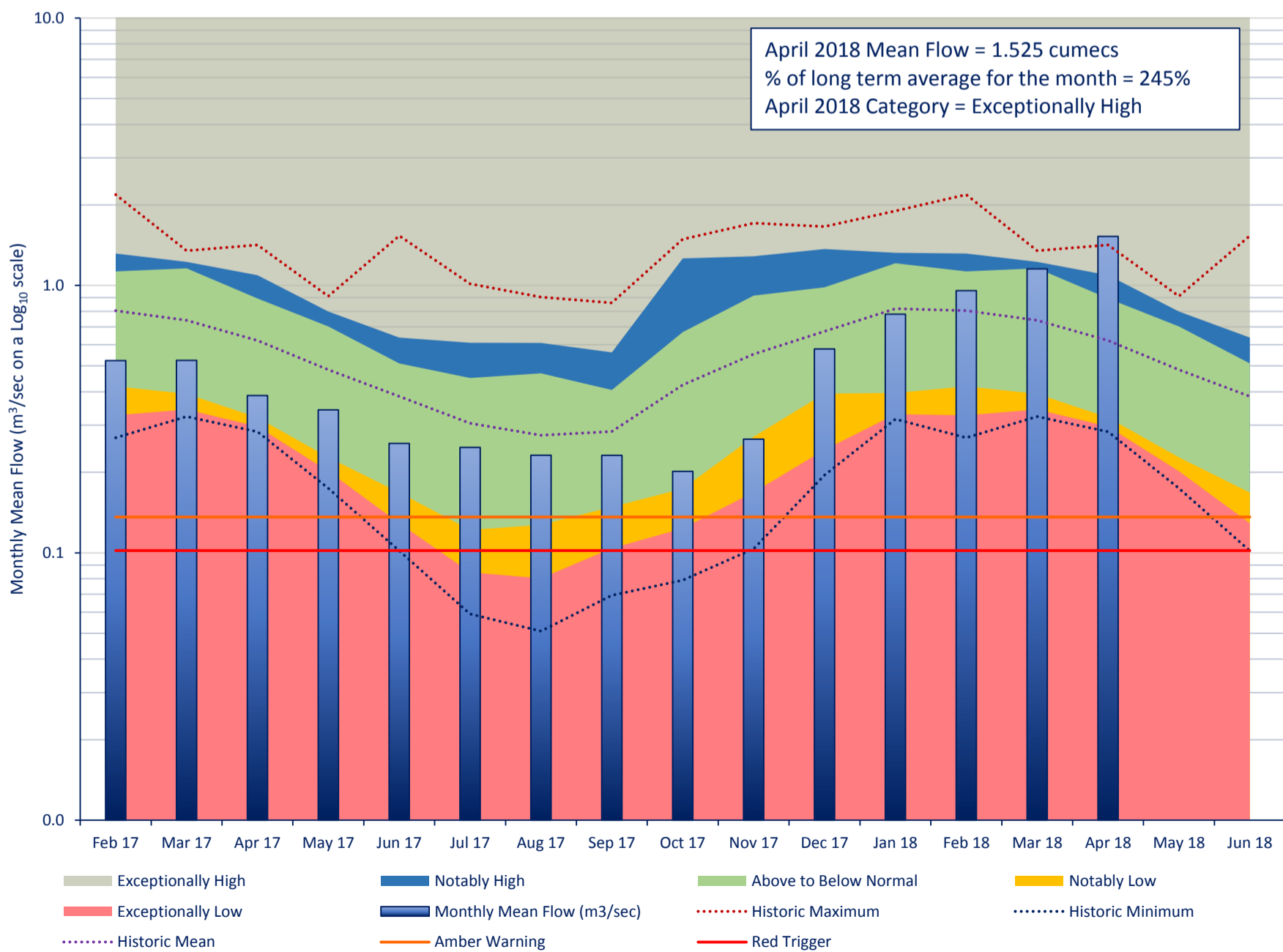
River Burn at Burnham Flow Categorisation 1970-2012 (Featured Years - 2017 to 2018)



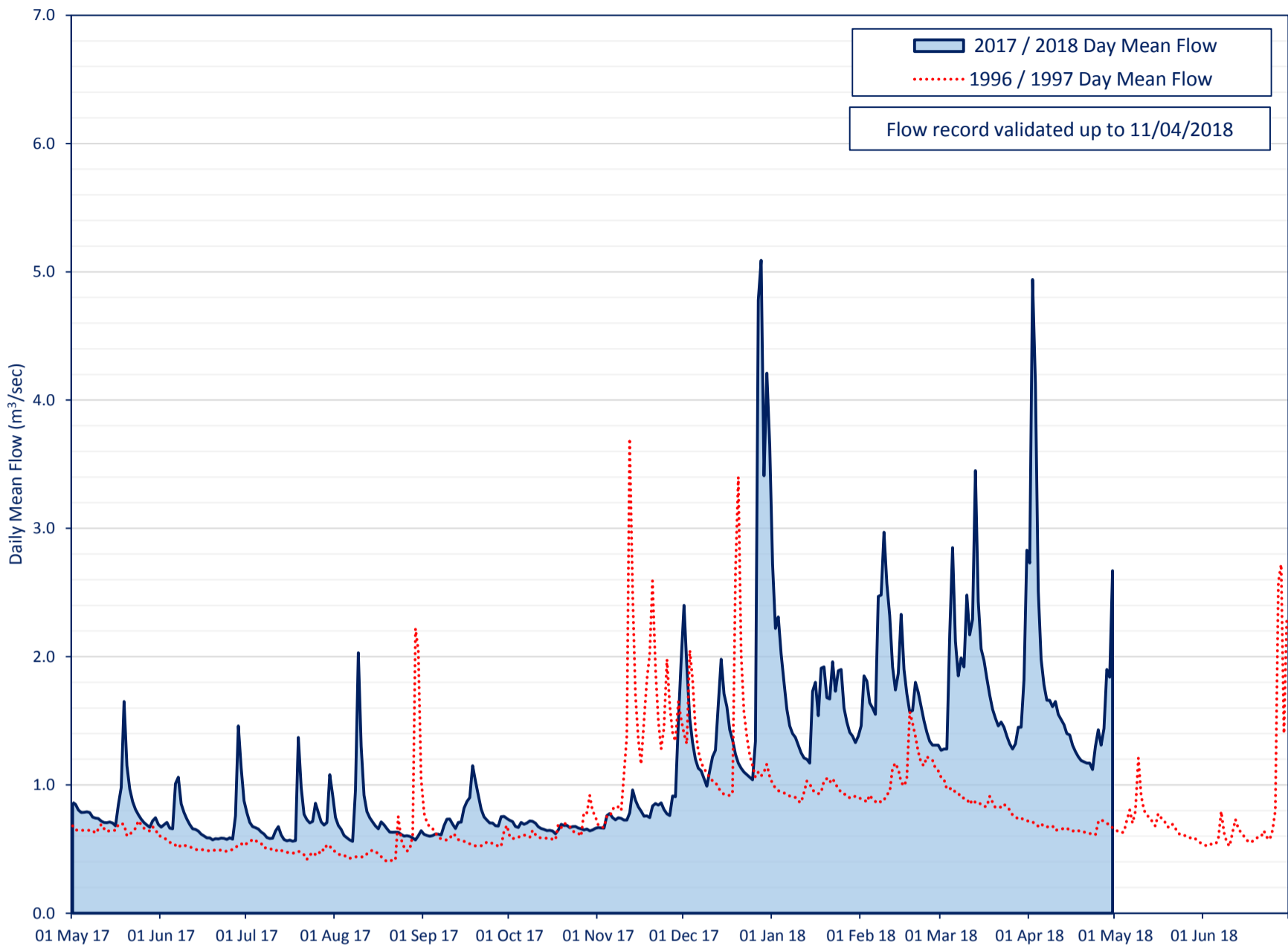
River Stiffkey at Warham (12 Month Hydrograph)



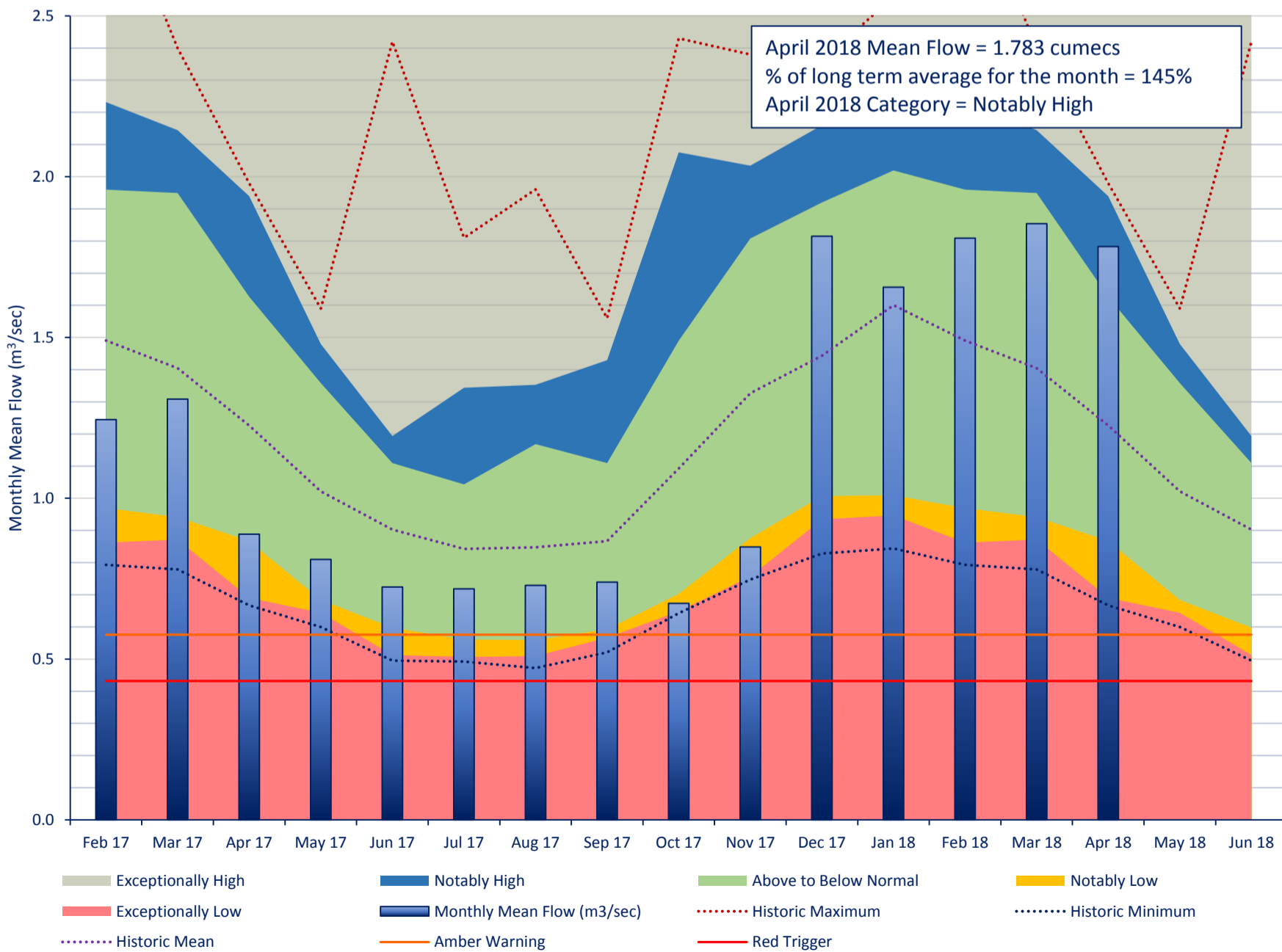
River Stiffkey at Warham Flow Categorisation 1970-2012 (Featured Years - 2017 to 2018)



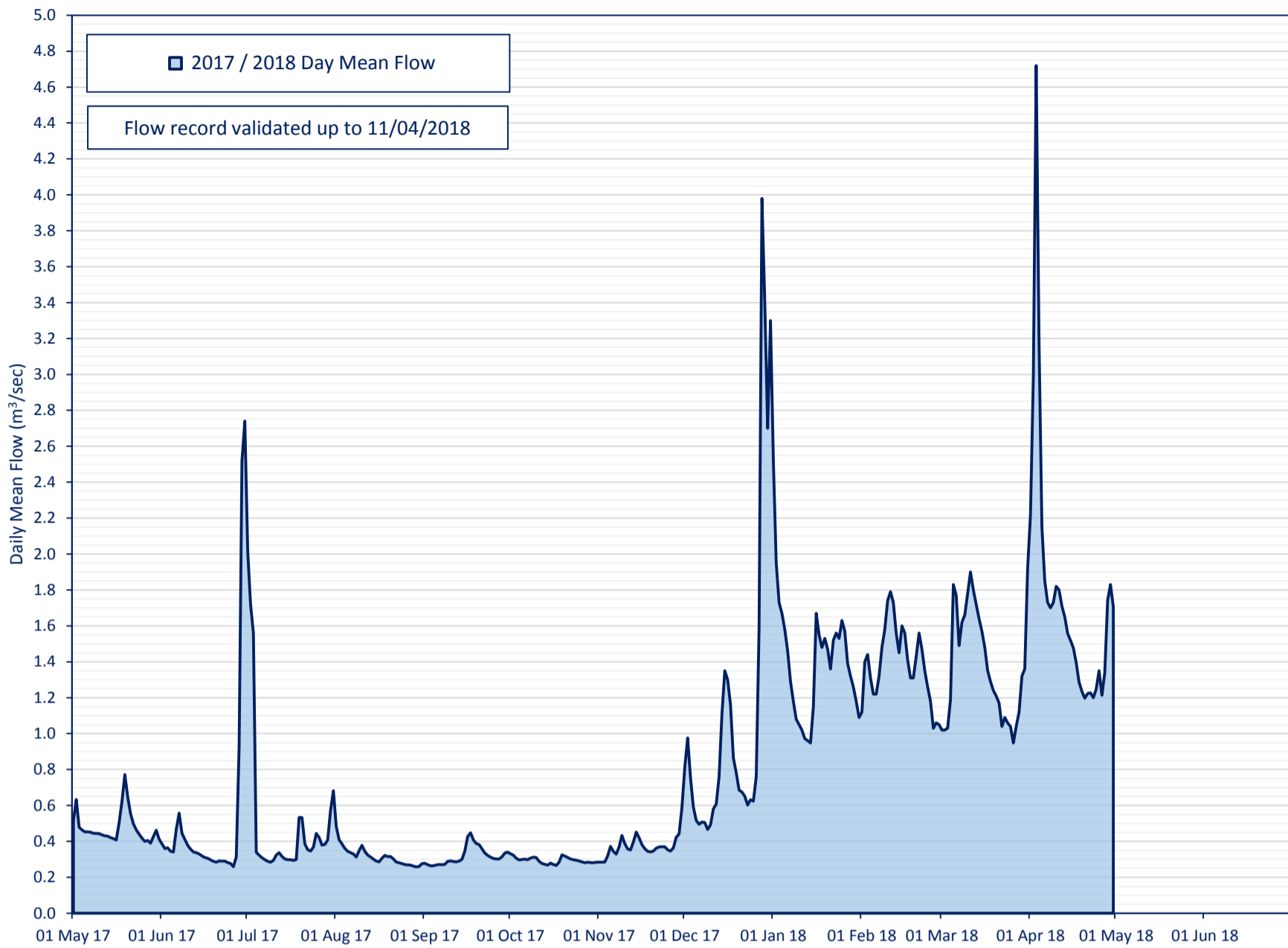
River Bure at Ingworth (12 Month Hydrograph)



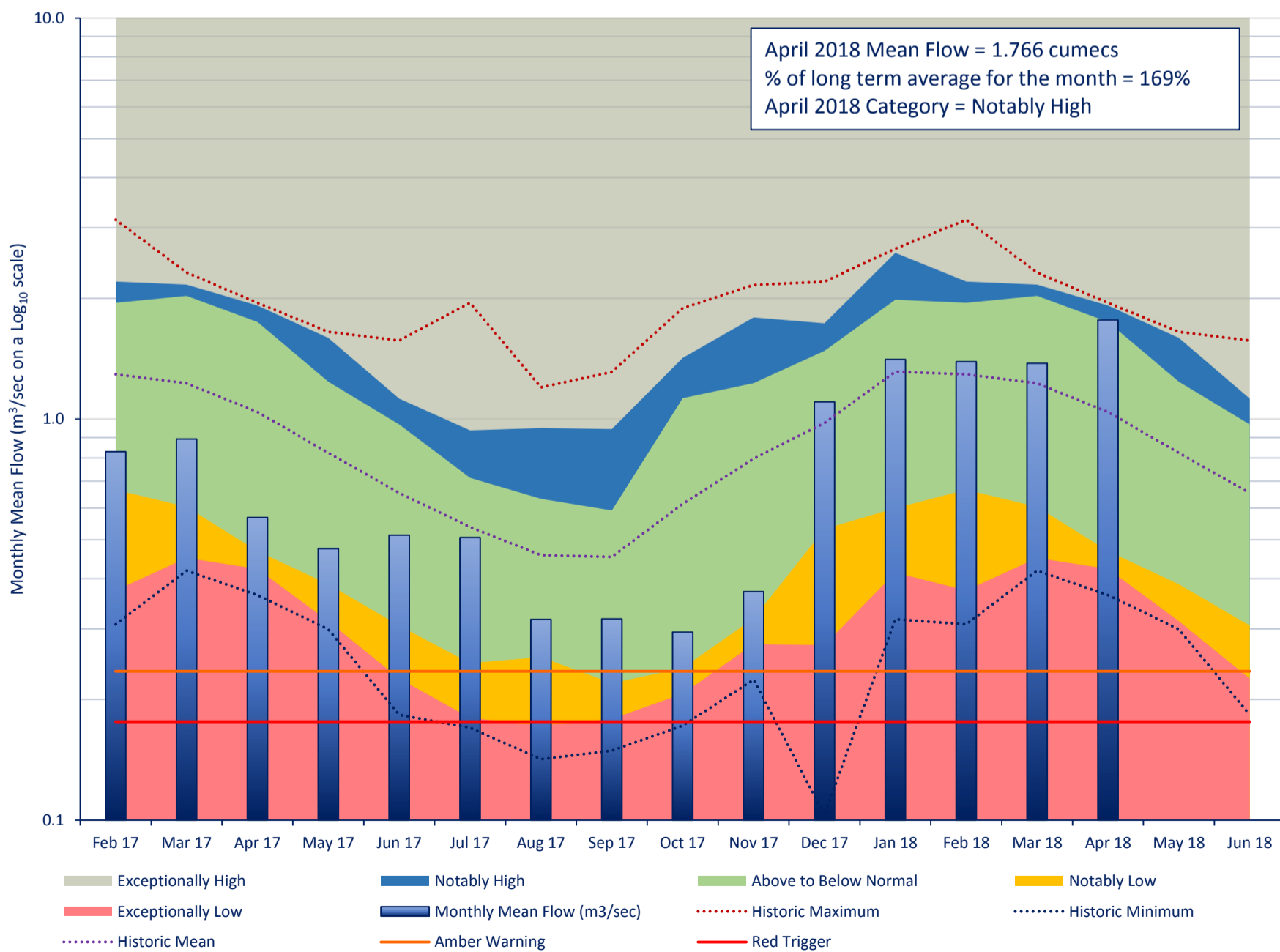
River Bure at Ingworth Flow Categorisation 1970-2012 (Featured Years - 2017 to 2018)



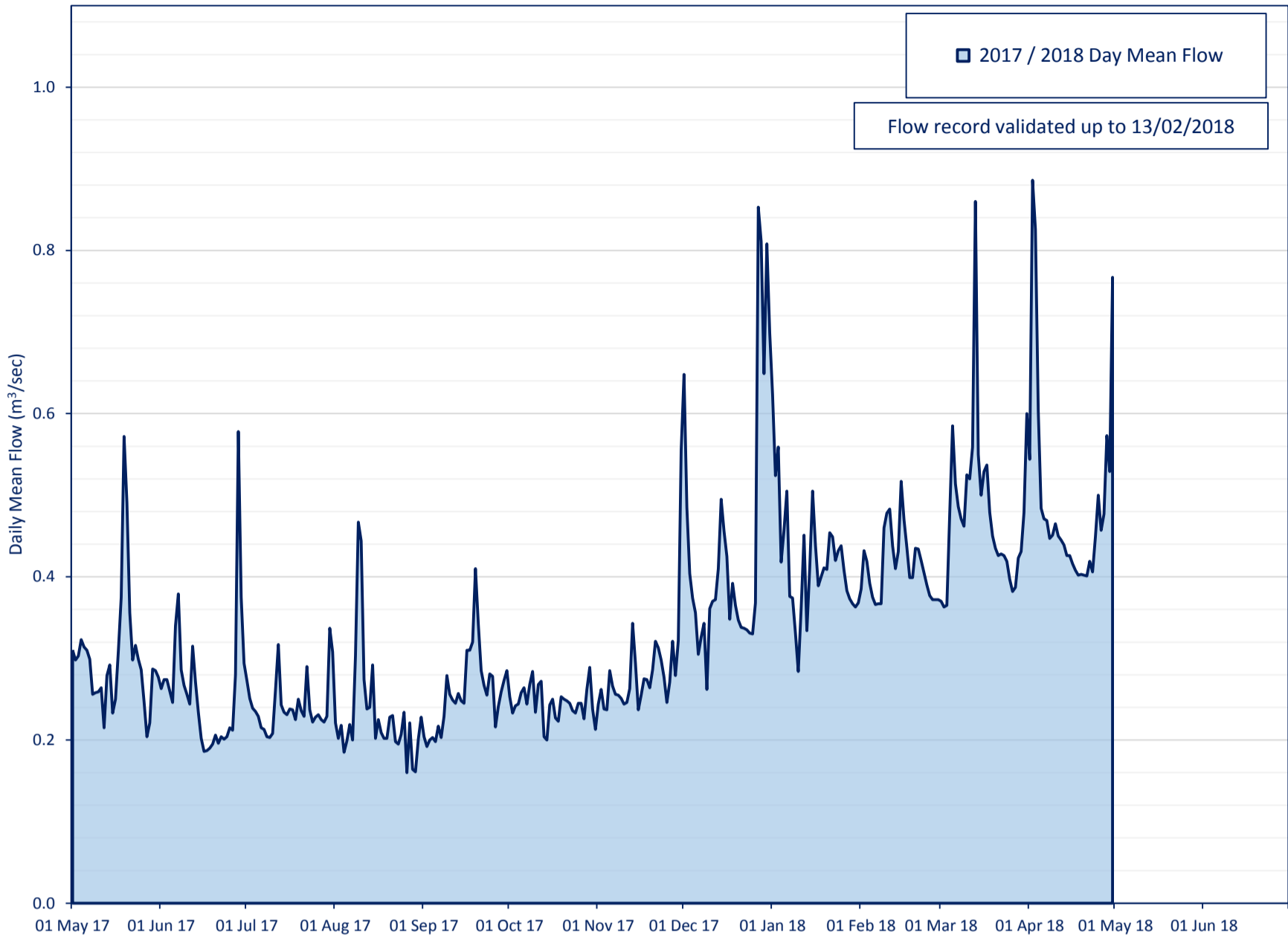
River Wensum at Fakenham (12 Month Hydrograph)



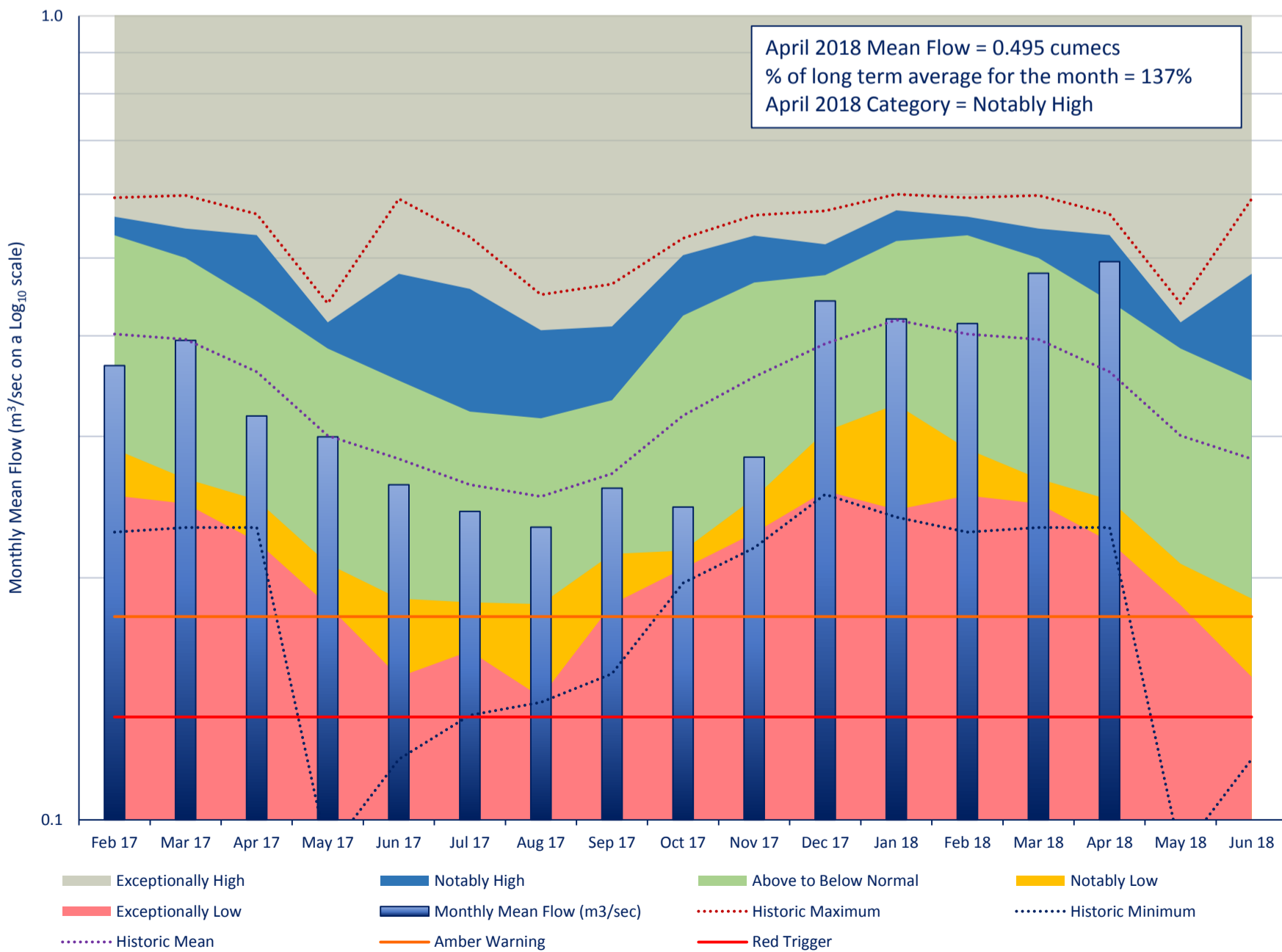
River Wensum at Fakenham Flow Categorisation 1970-2012 (Featured Years - 2017 to 2018)



River Ant at Honing Lock (12 Month Hydrograph)

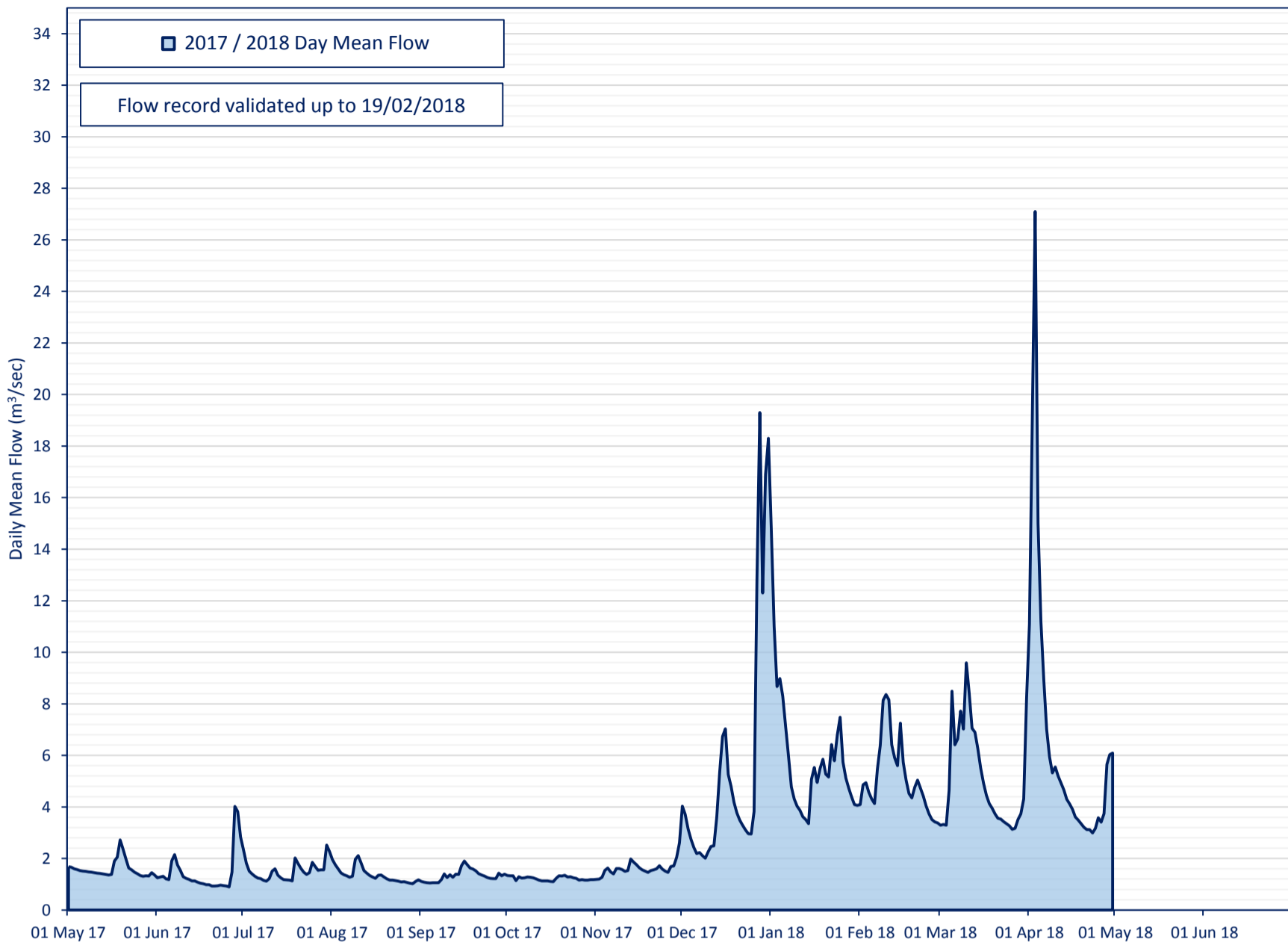


River Ant at Honing Lock Flow Categorisation 1970-2012 (Featured Years - 2017 to 2018)

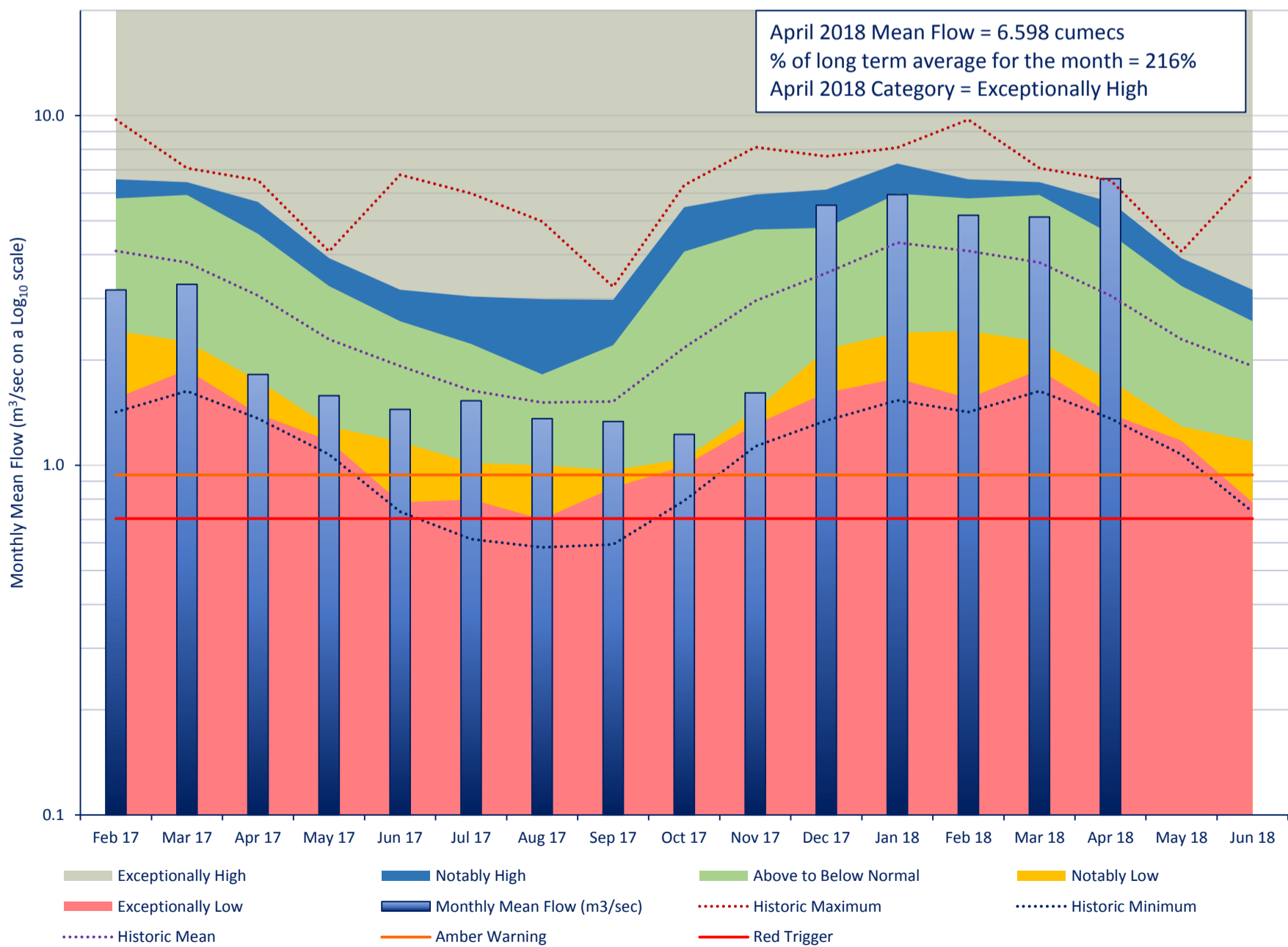




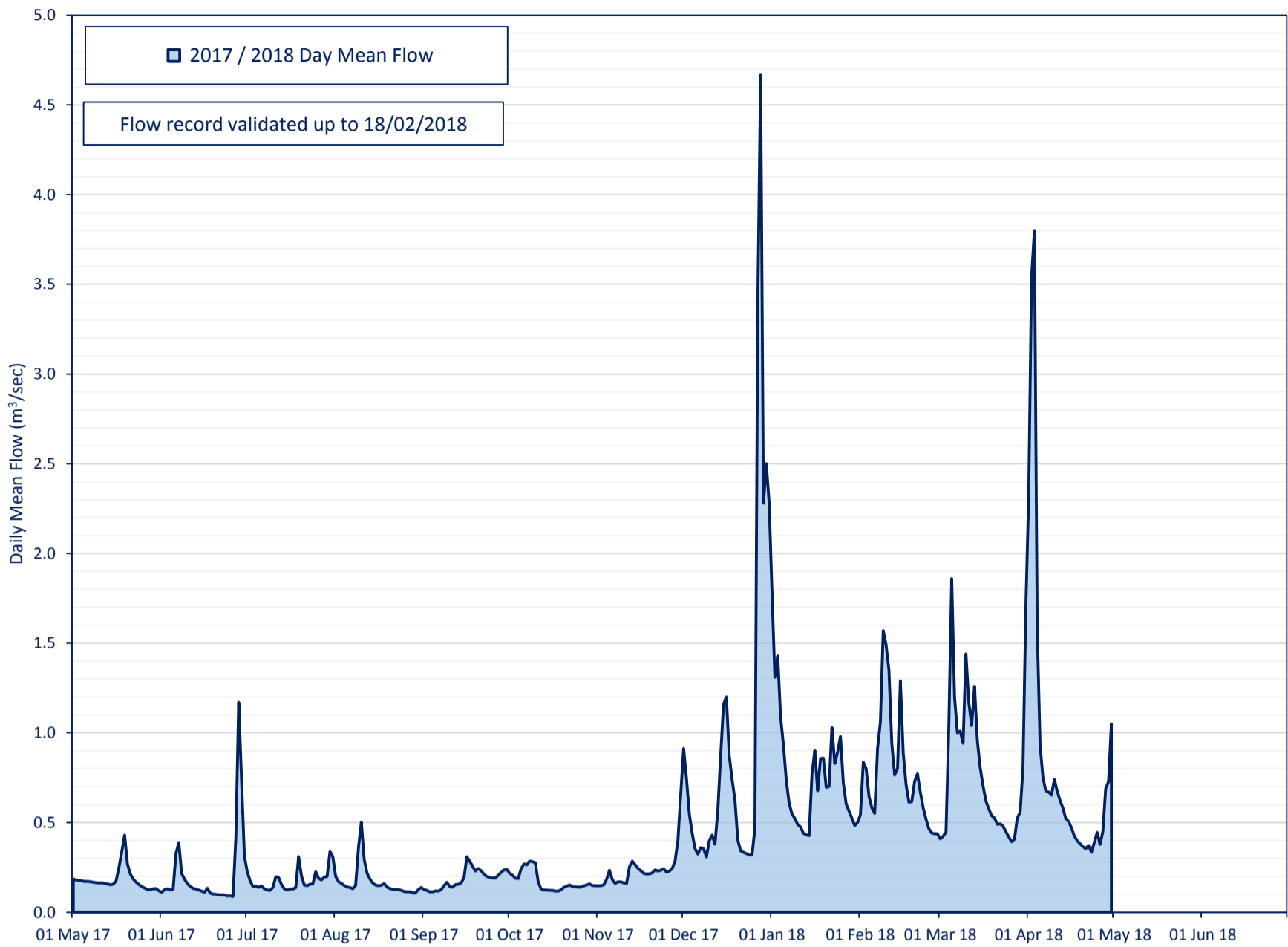
### River Wensum at Swanton Morley (12 Month Hydrograph)



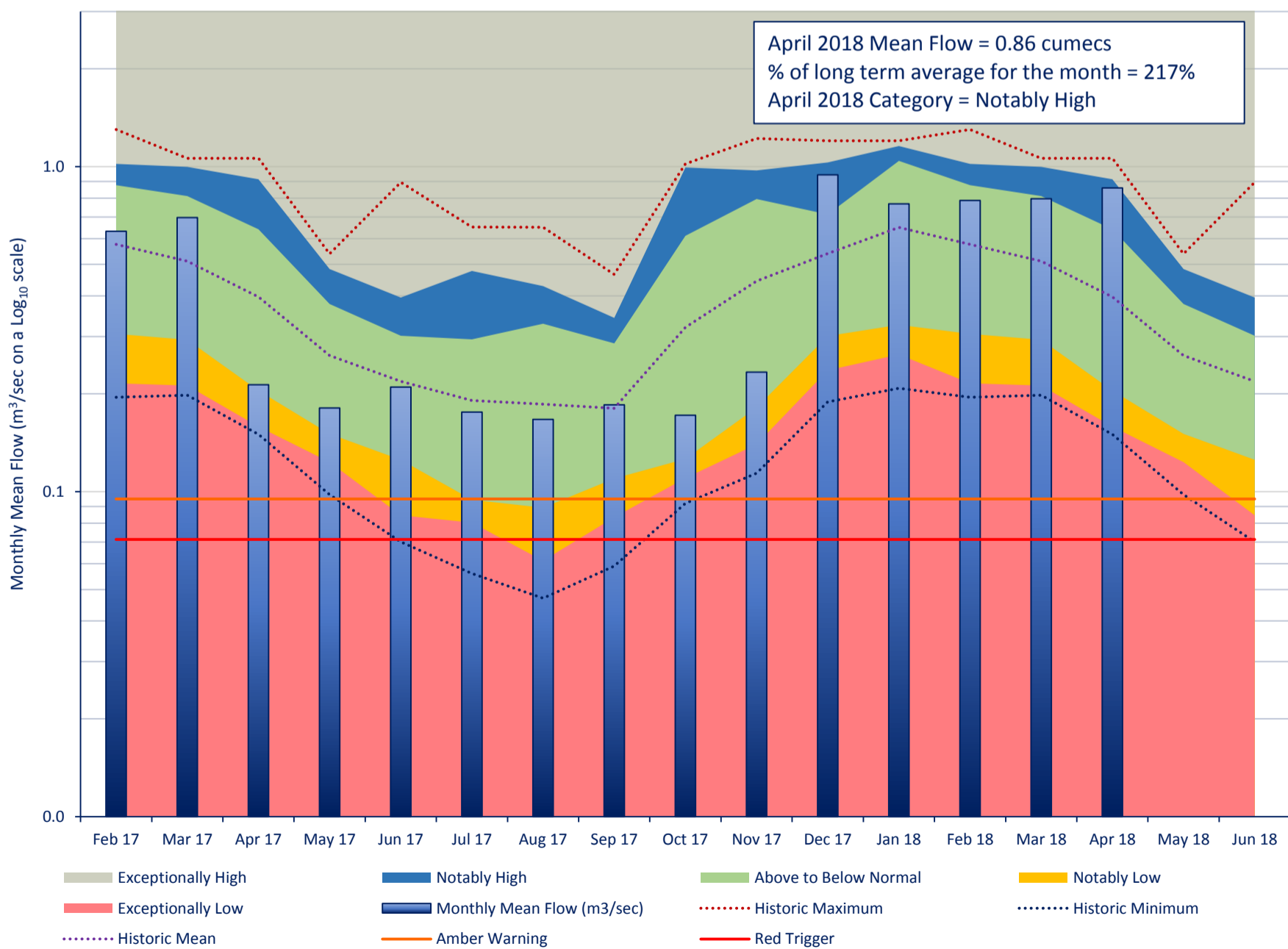
### River Wensum at Swanton Morley Flow Categorisation 1969-2017 (Featured Years - 2017 to 2018)



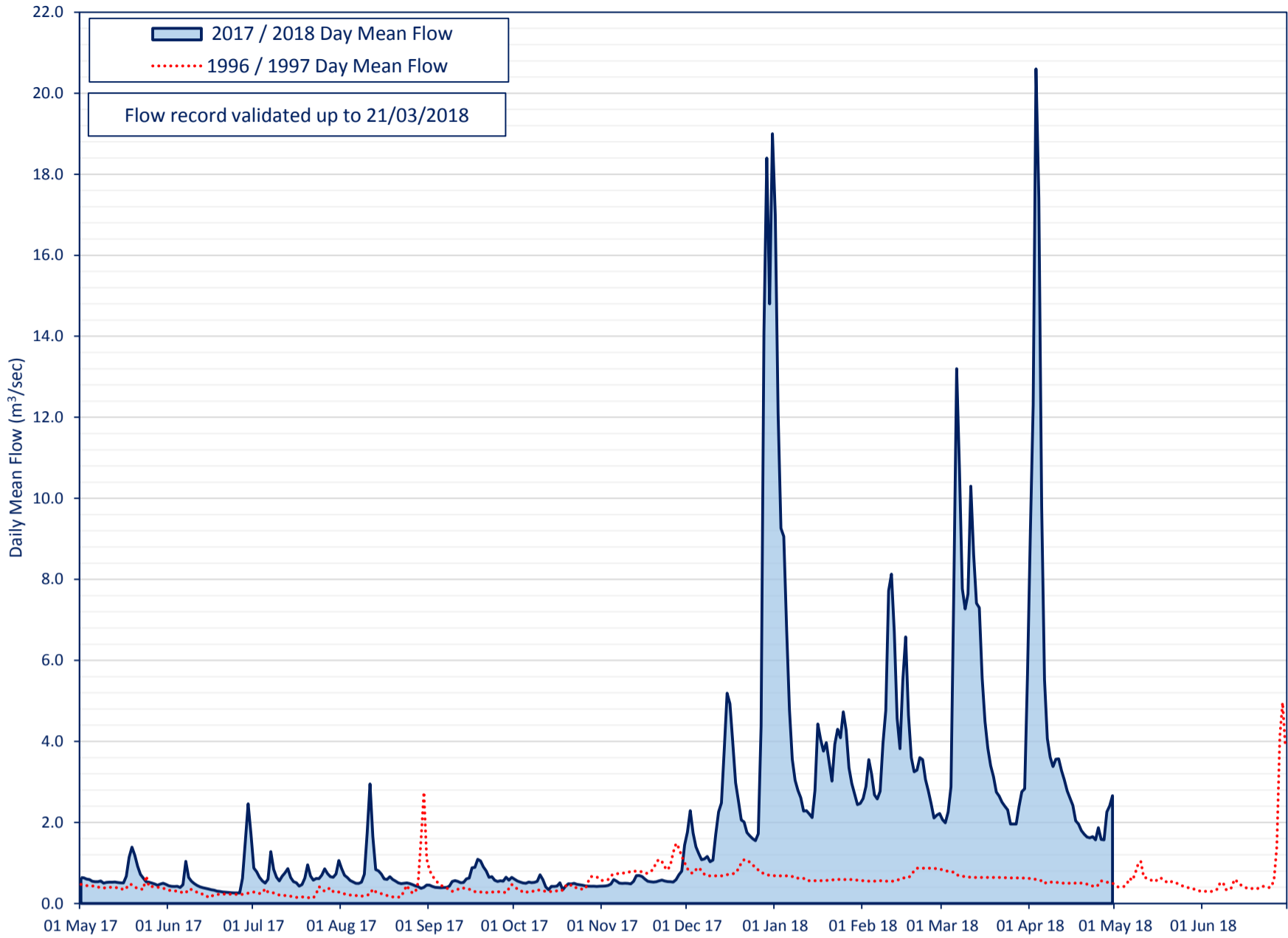
River Tud at Costessey Park (12 Month Hydrograph)



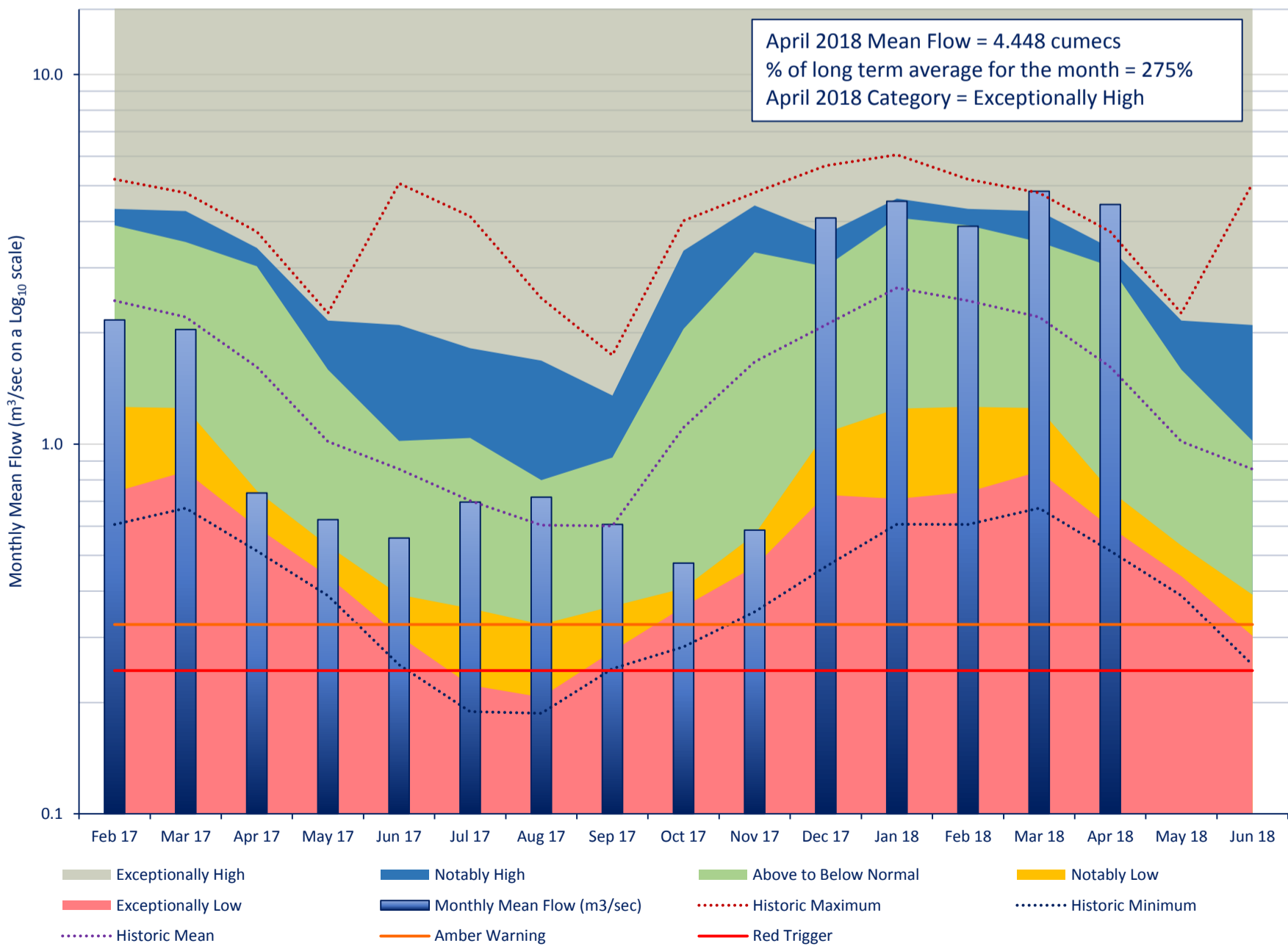
River Tud at Costessey Park Flow Categorisation 1970-2012 (Featured Years - 2017 to 2018)



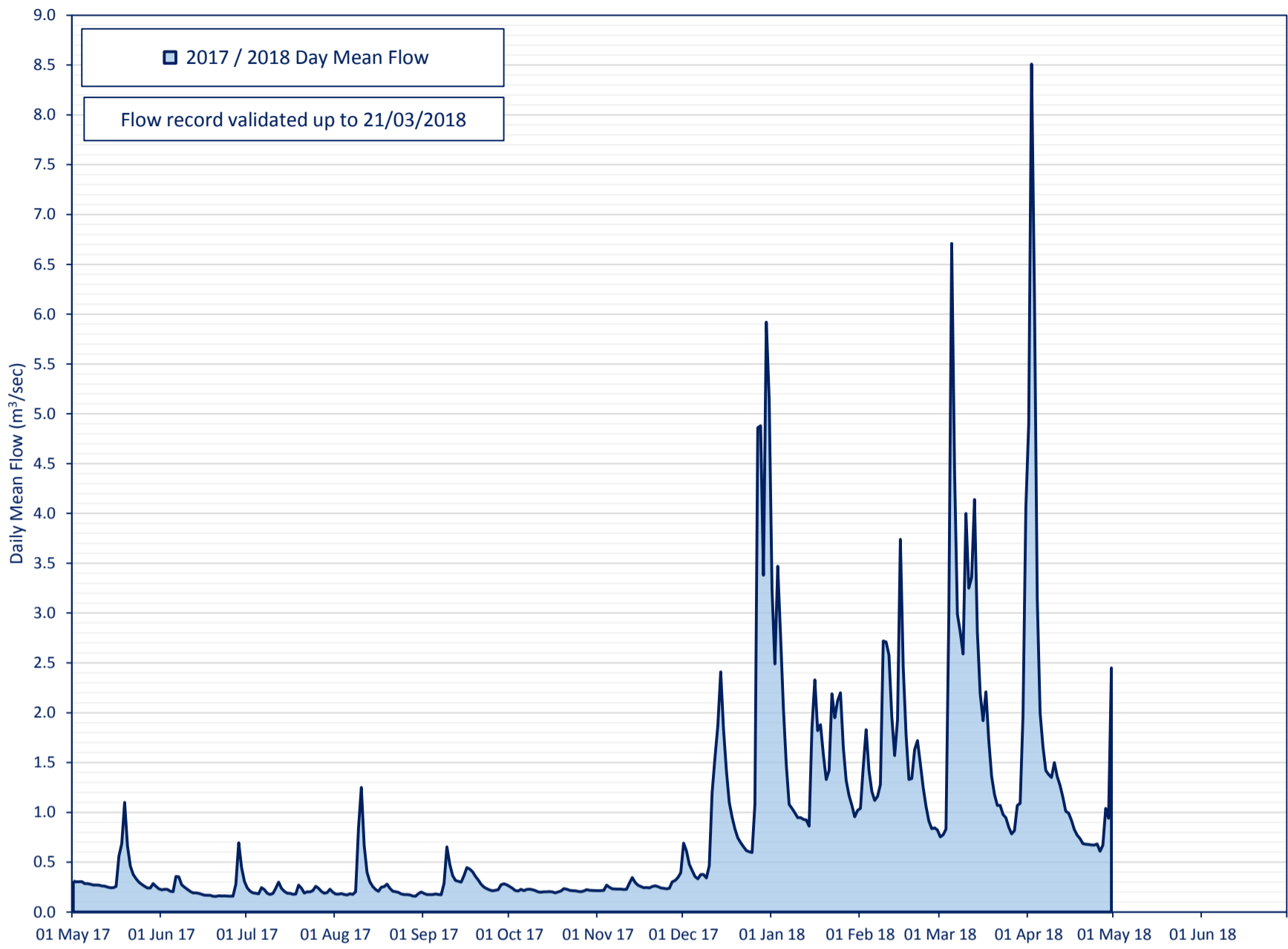
River Yare at Colney (12 Month Hydrograph)



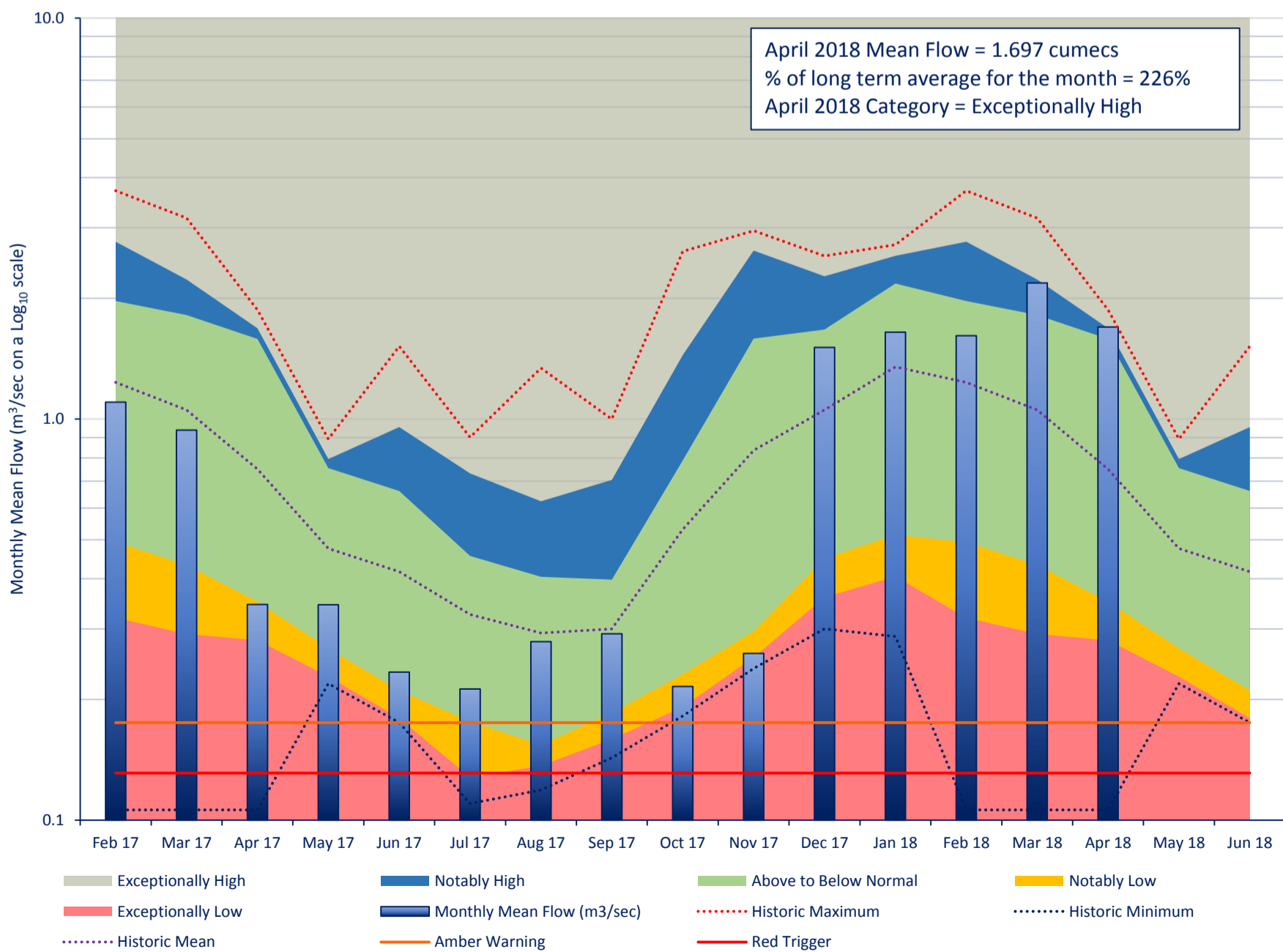
River Yare at Colney Flow Categorisation 1970-2012 (Featured Years - 2017 to 2018)



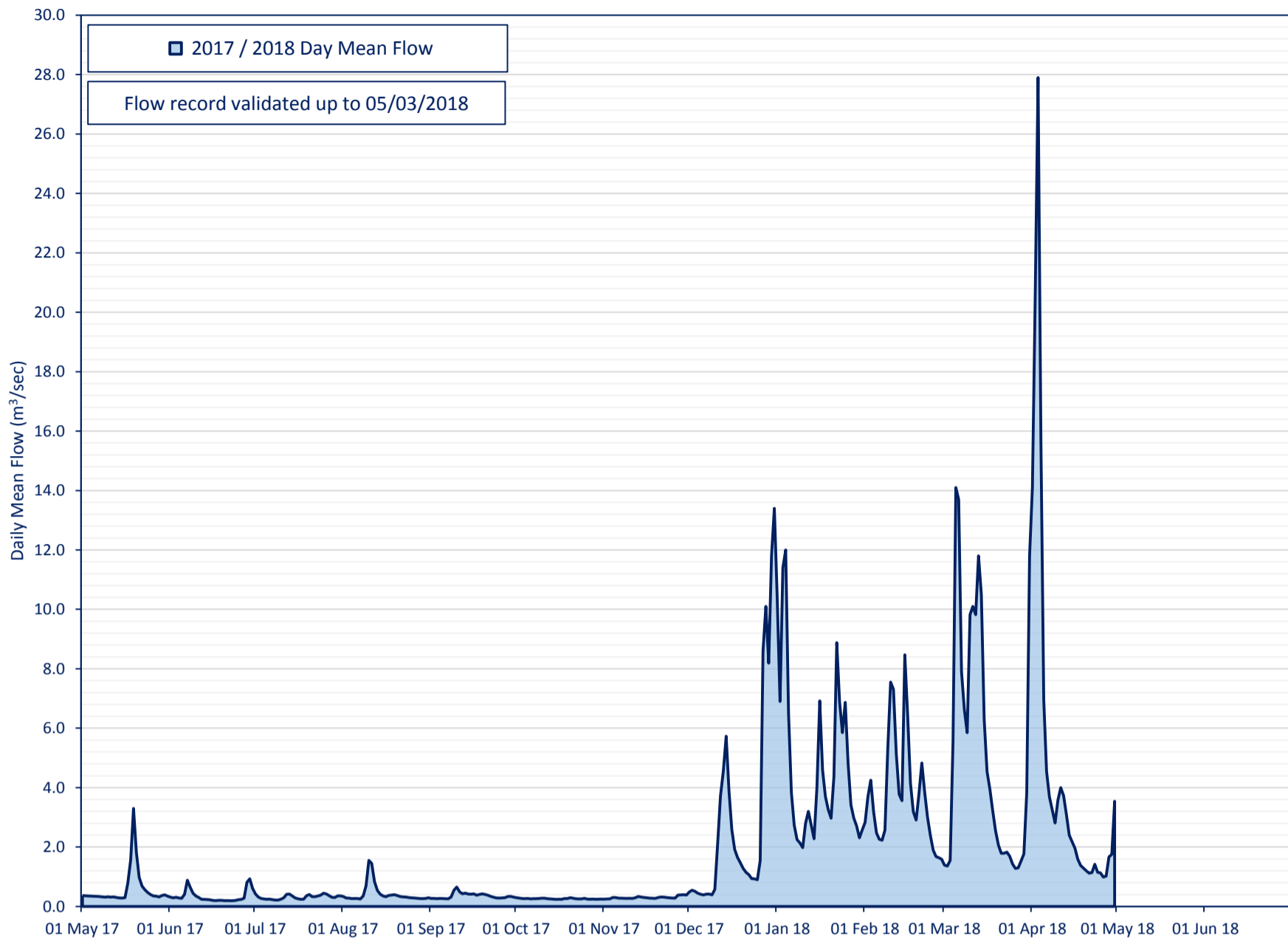
River Tas at Shotesham (12 Month Hydrograph)



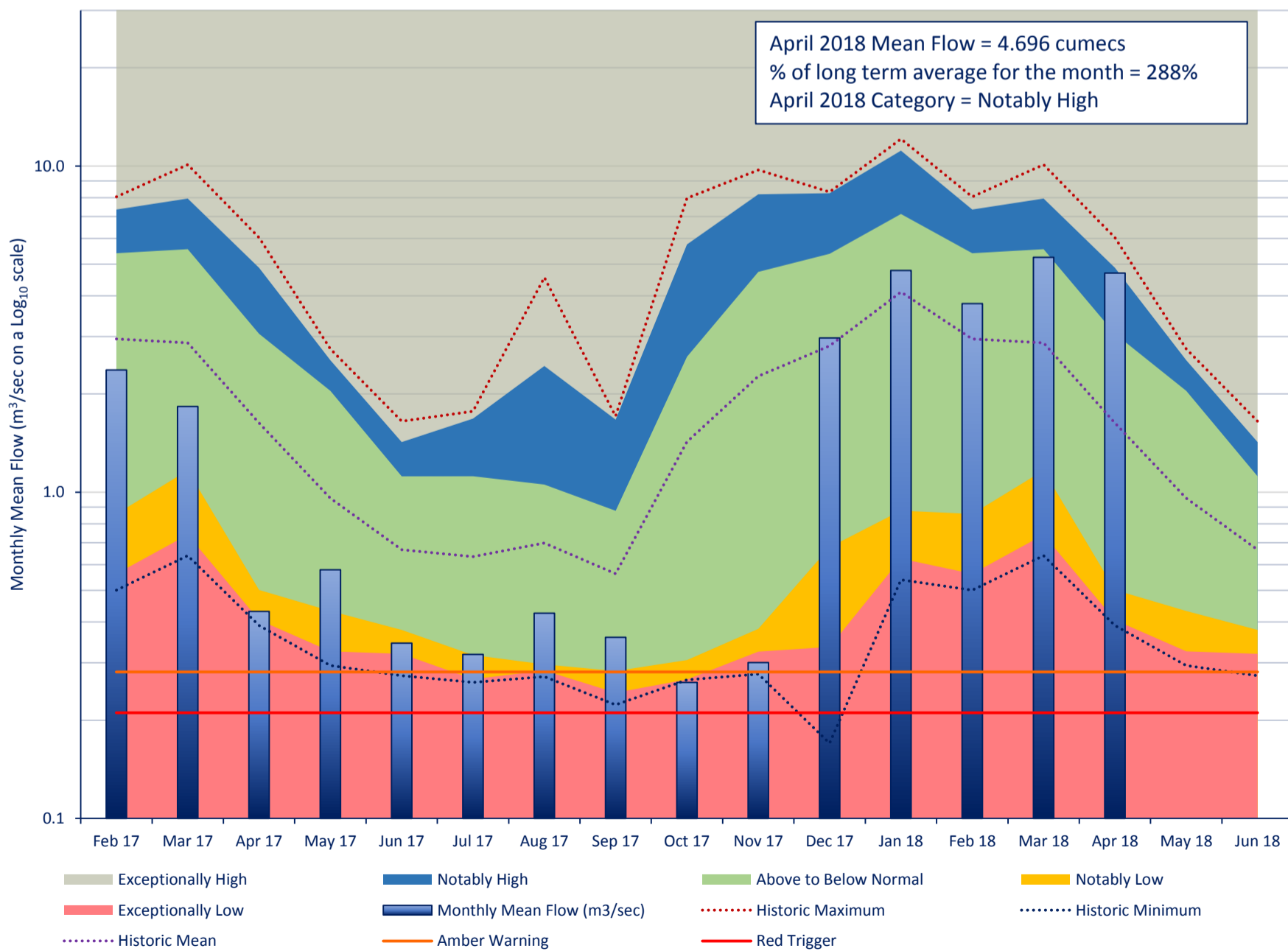
River Tas at Shotesham Flow Categorisation 1970-2012 (Featured Years - 2017 to 2018)



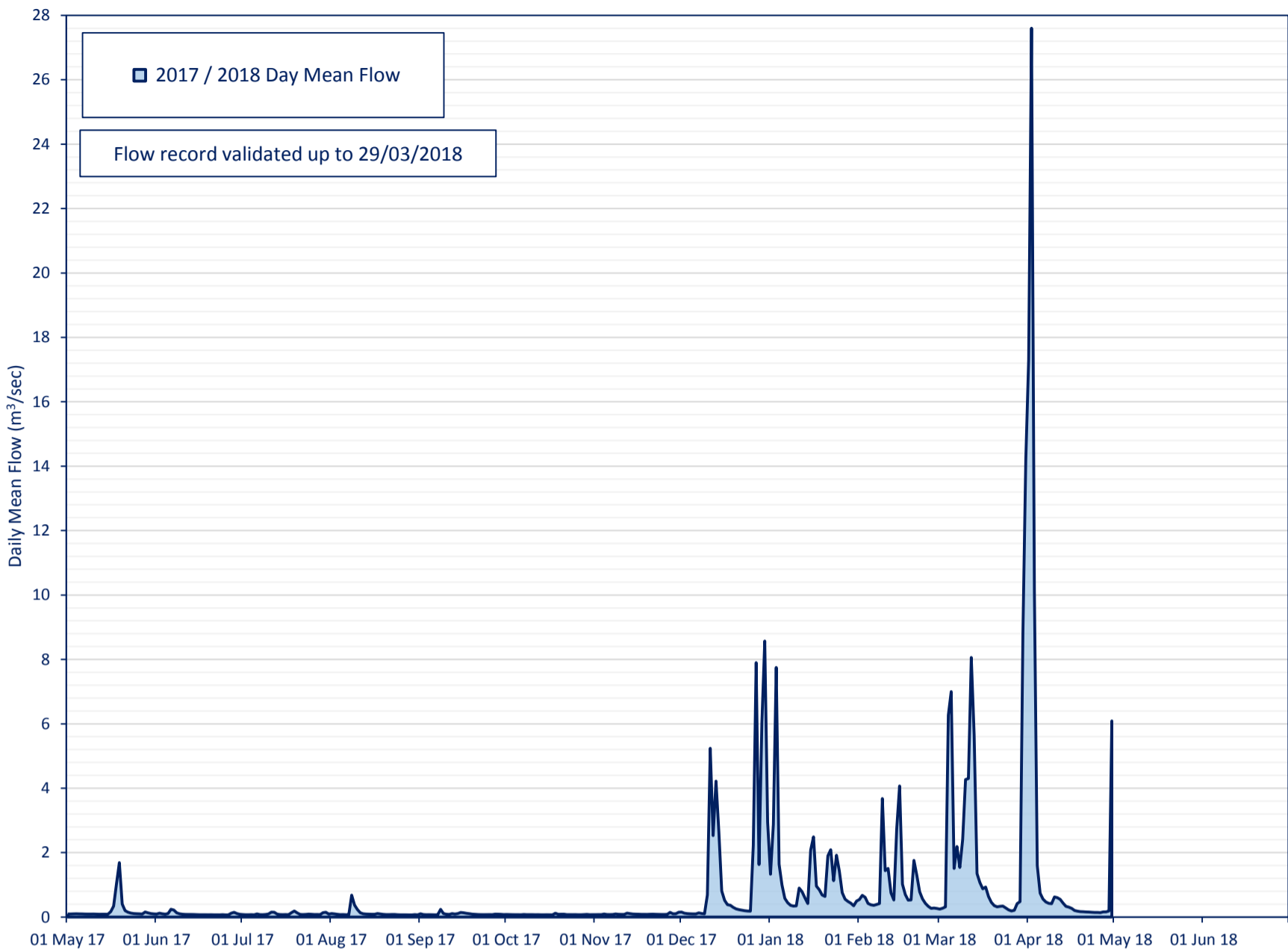
River Waveney at Needham (12 Month Hydrograph)



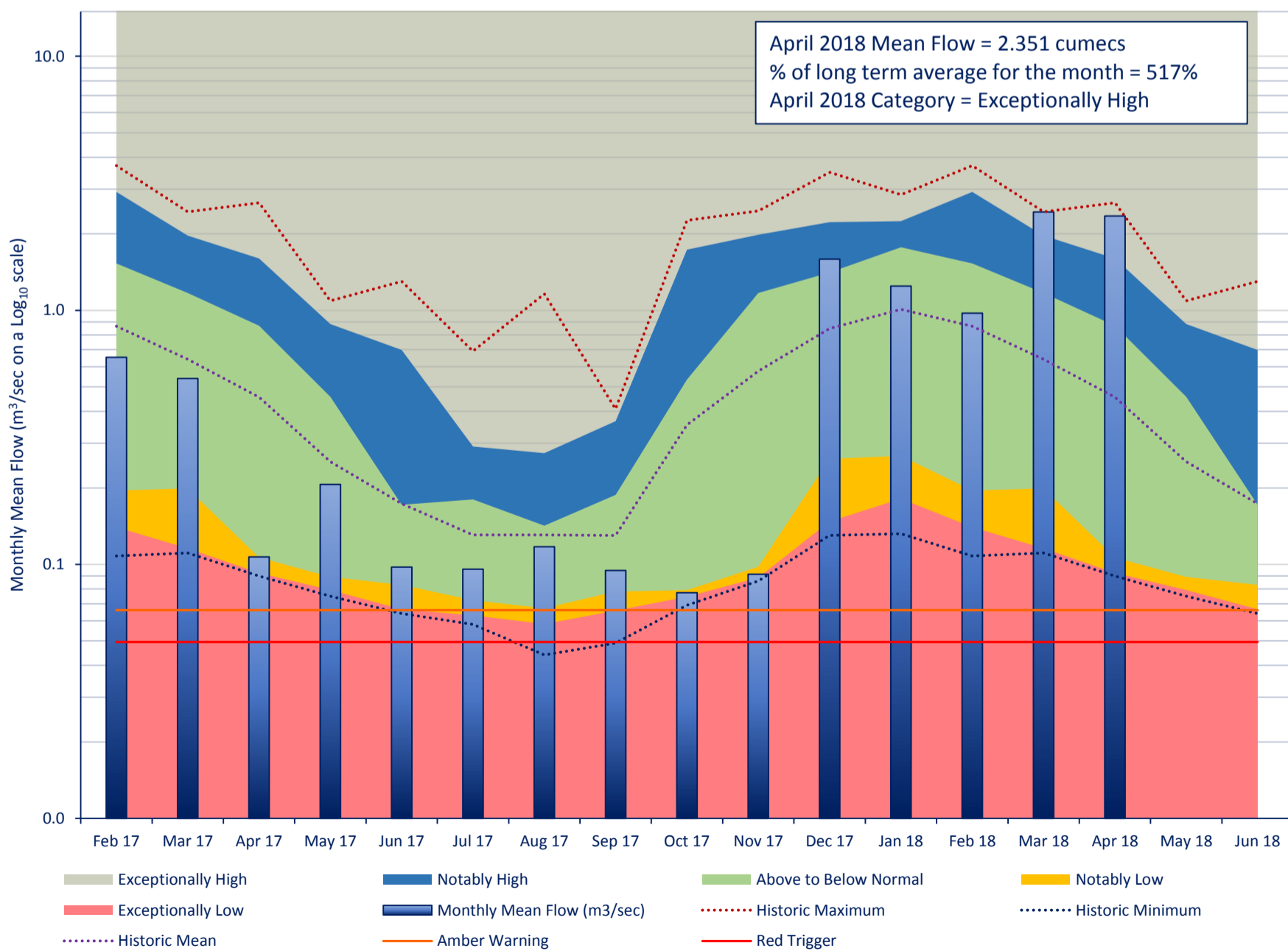
River Waveney at Needham Flow Categorisation 1970-2012 (Featured Years - 2017 to 2018)



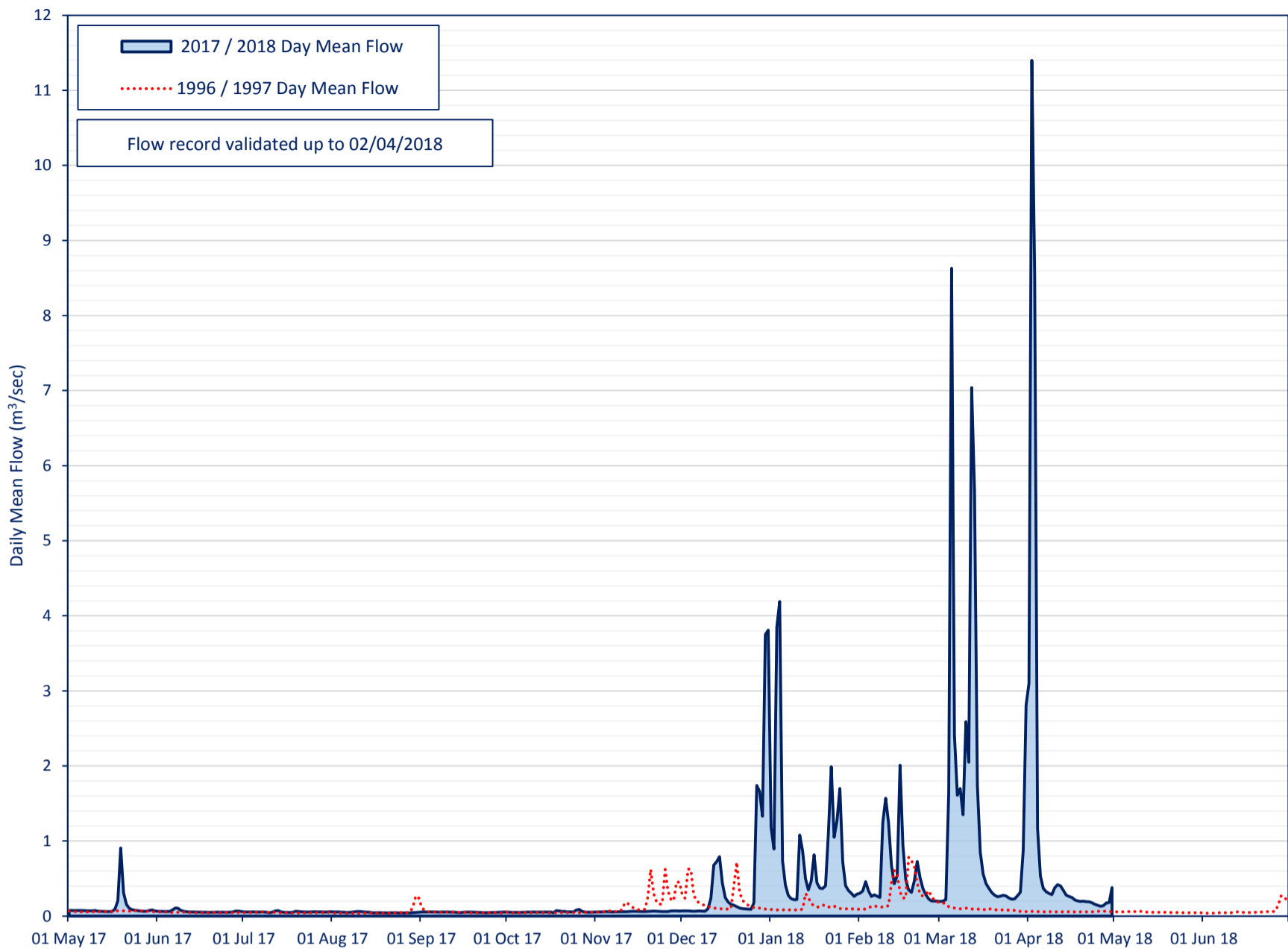
River Blyth at Holton (12 Month Hydrograph)



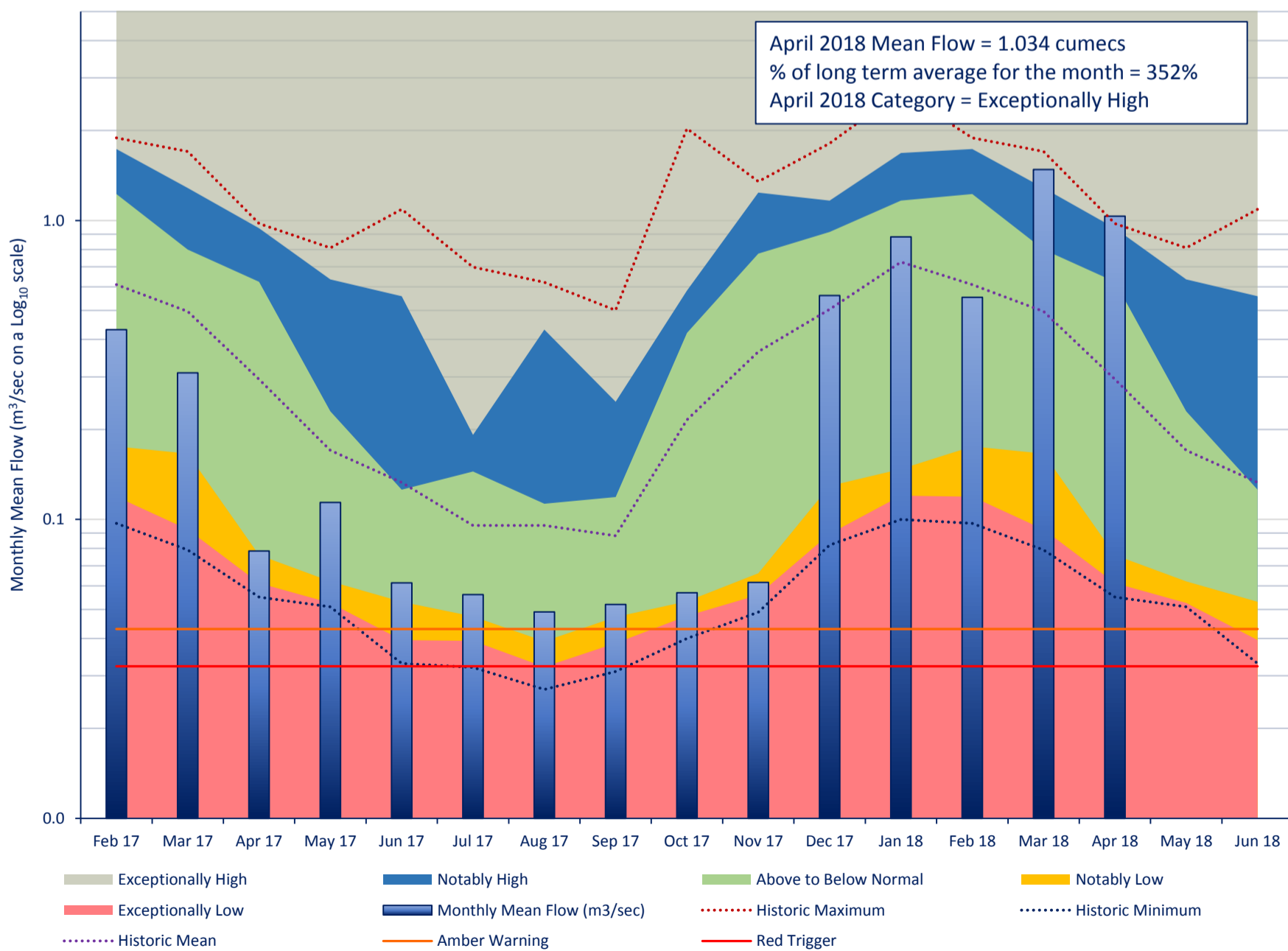
River Blyth at Holton Flow Categorisation 1970-2012 (Featured Years - 2017 to 2018)



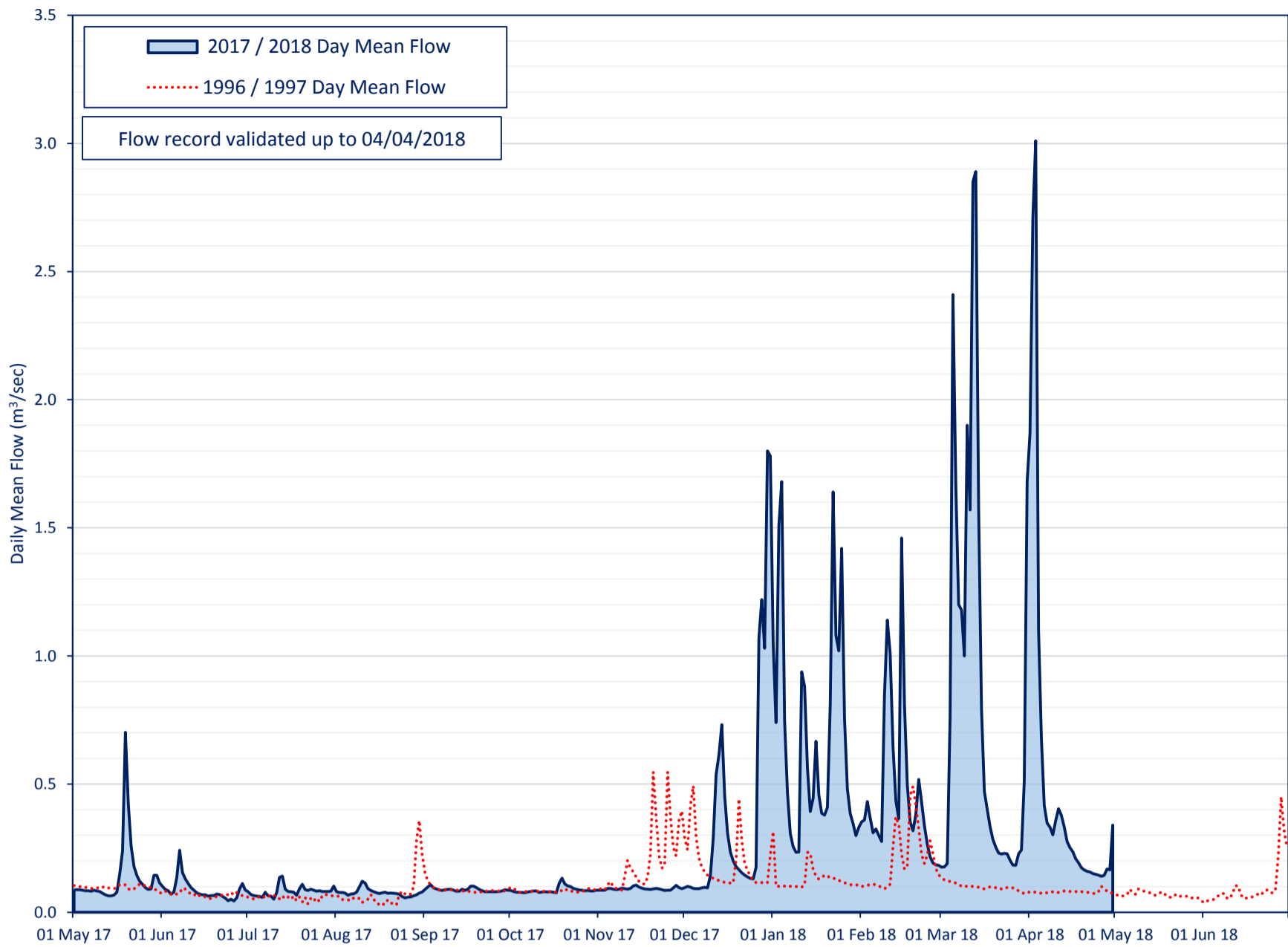
River Alde at Farnham (12 Month Hydrograph)



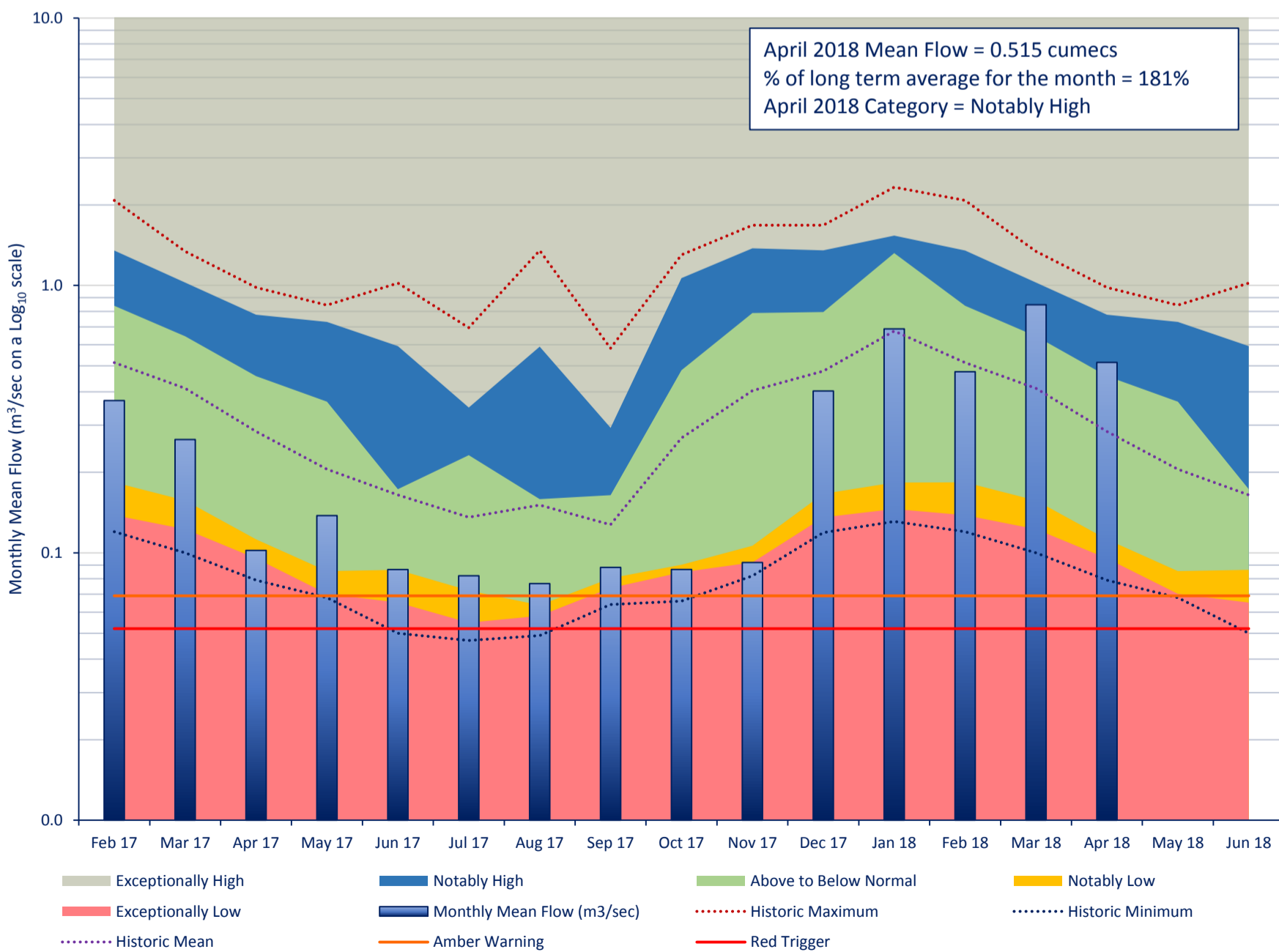
River Alde at Farnham Flow Categorisation 1970-2012 (Featured Years - 2017 to 2018)



River Ore at Beversham (12 Month Hydrograph)

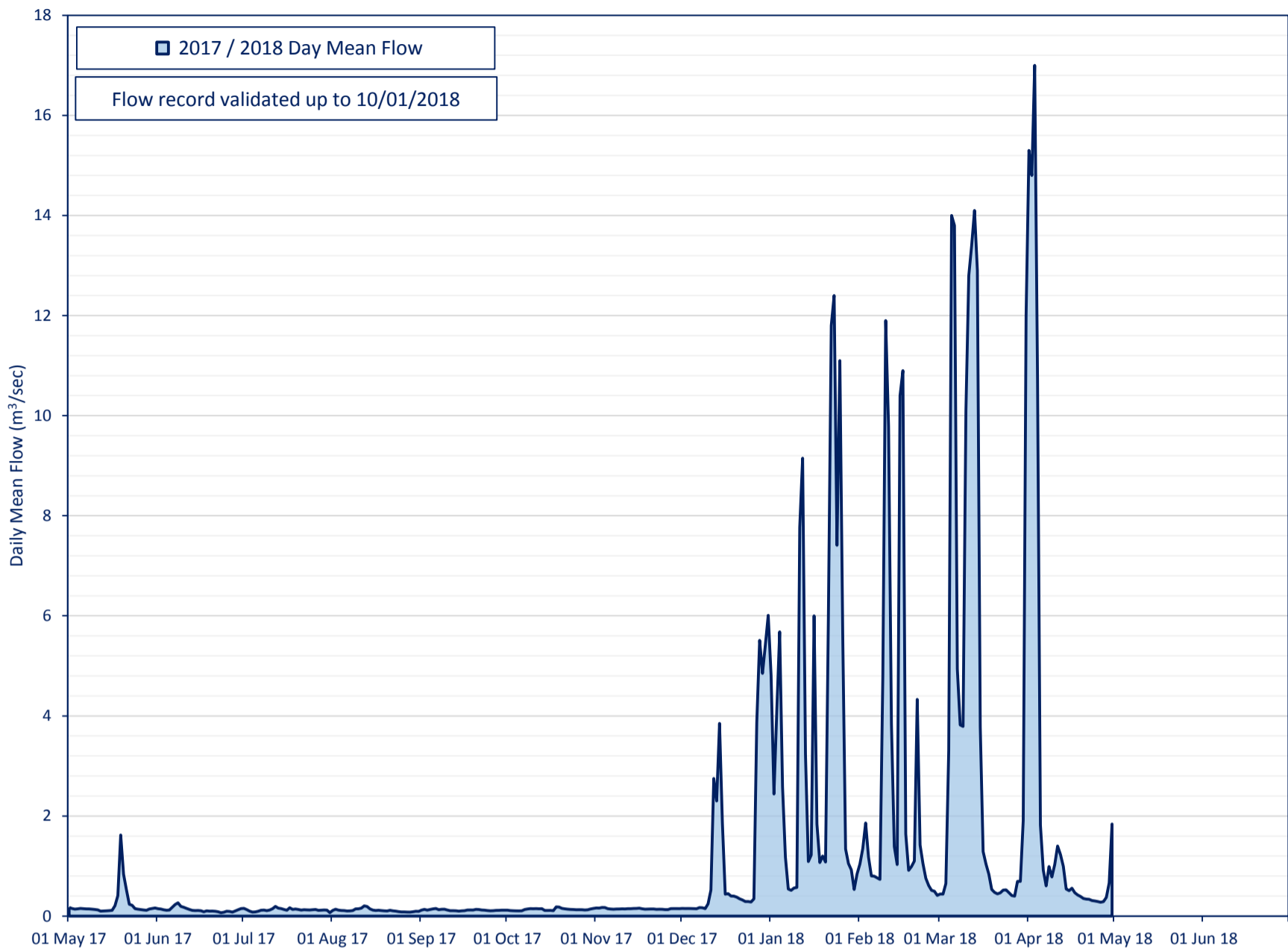


River Ore at Beversham Flow Categorisation 1970-2012 (Featured Years - 2017 to 2018)

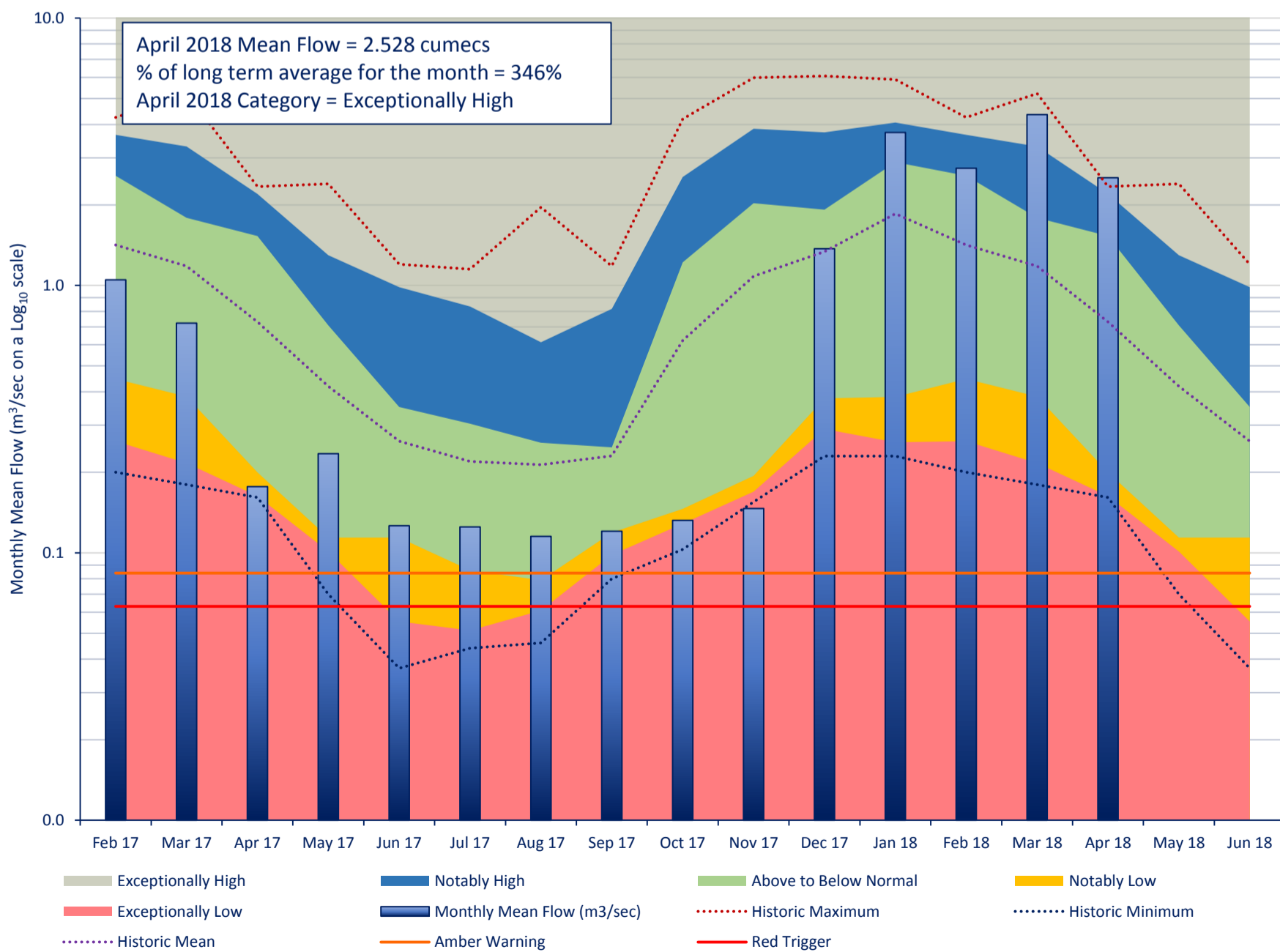




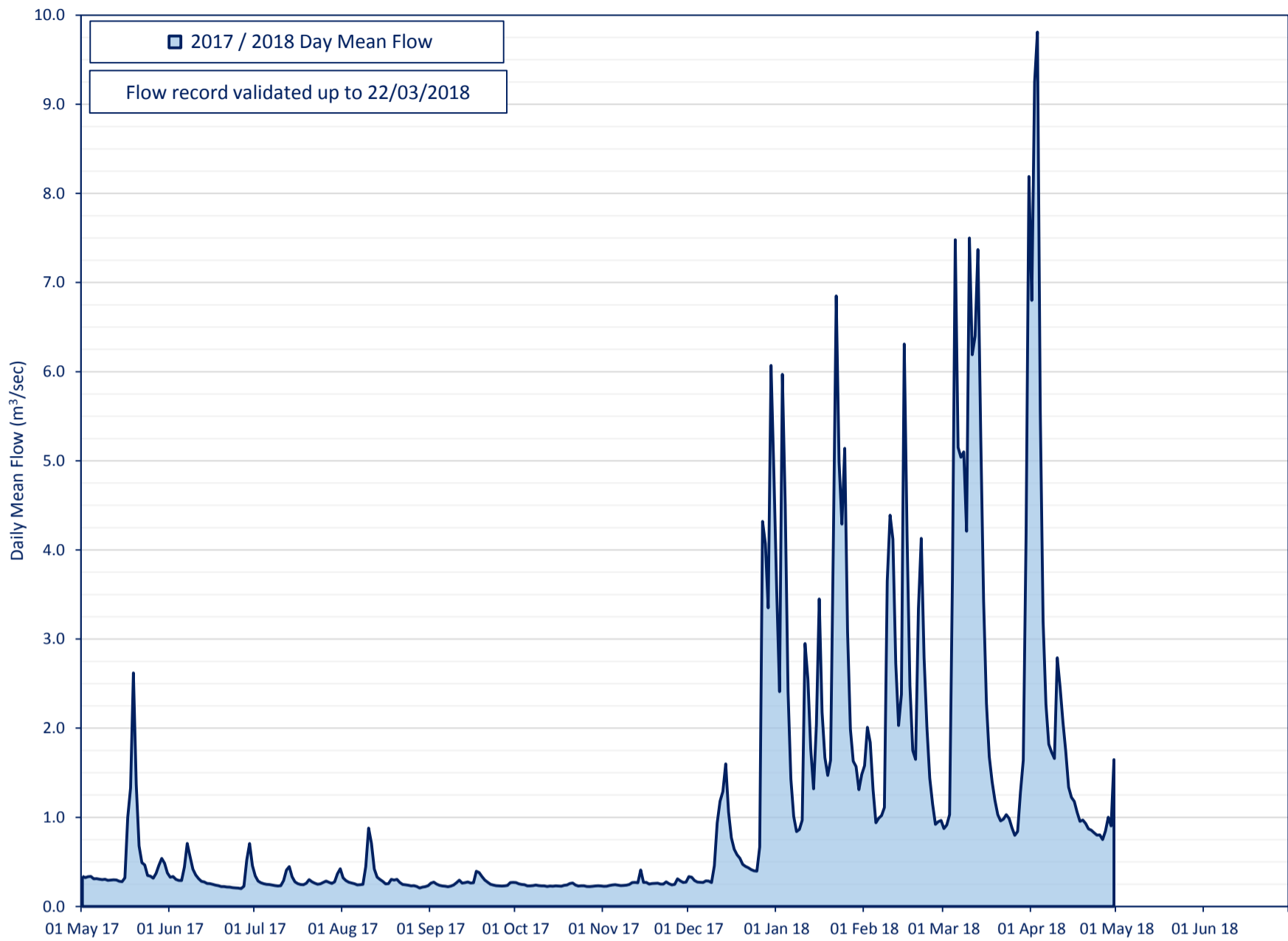
River Deben at Naunton Hall (12 Month Hydrograph)



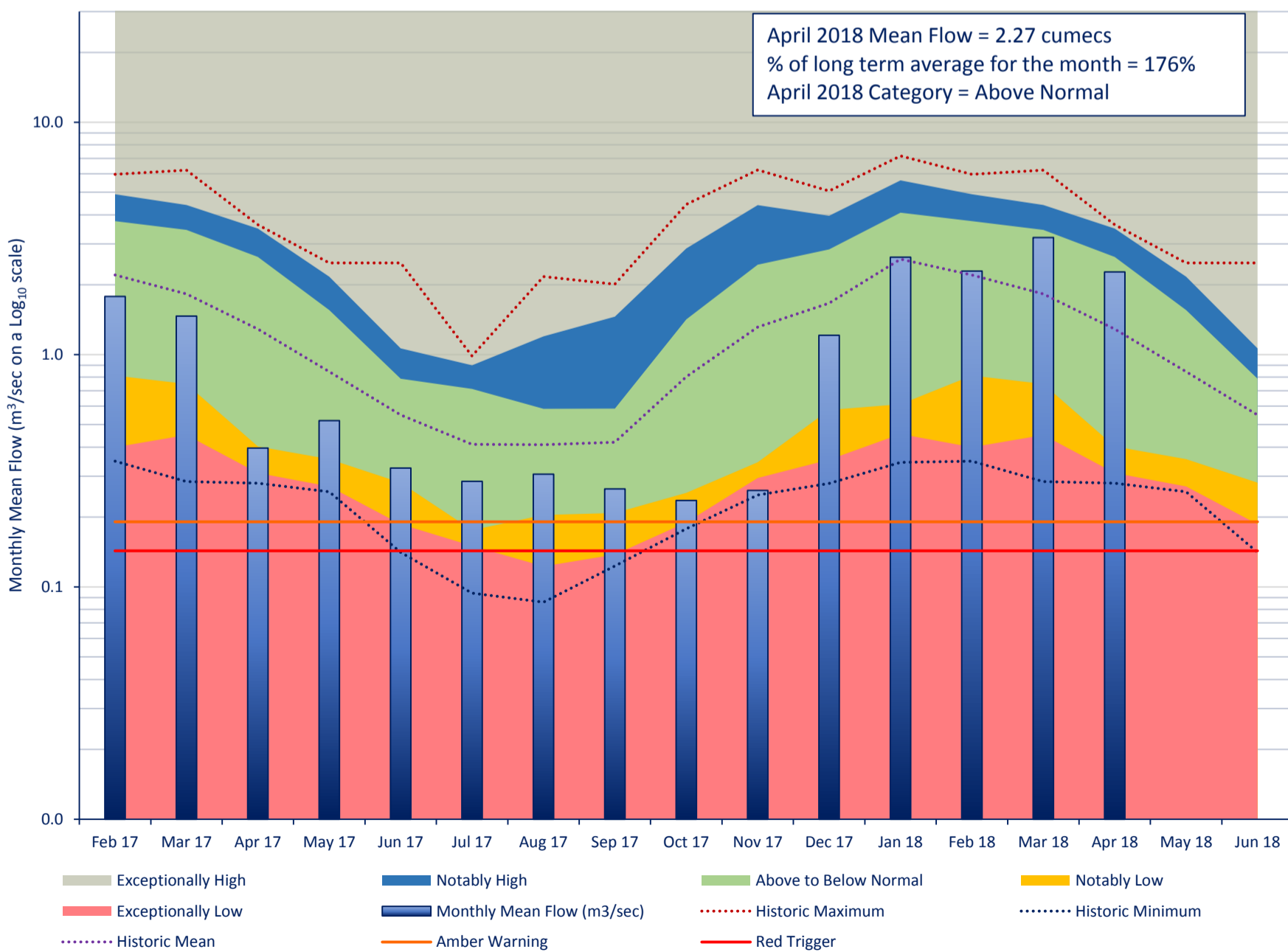
River Deben at Naunton Hall Flow Categorisation 1970-2012 (Featured Years - 2017 to 2018)



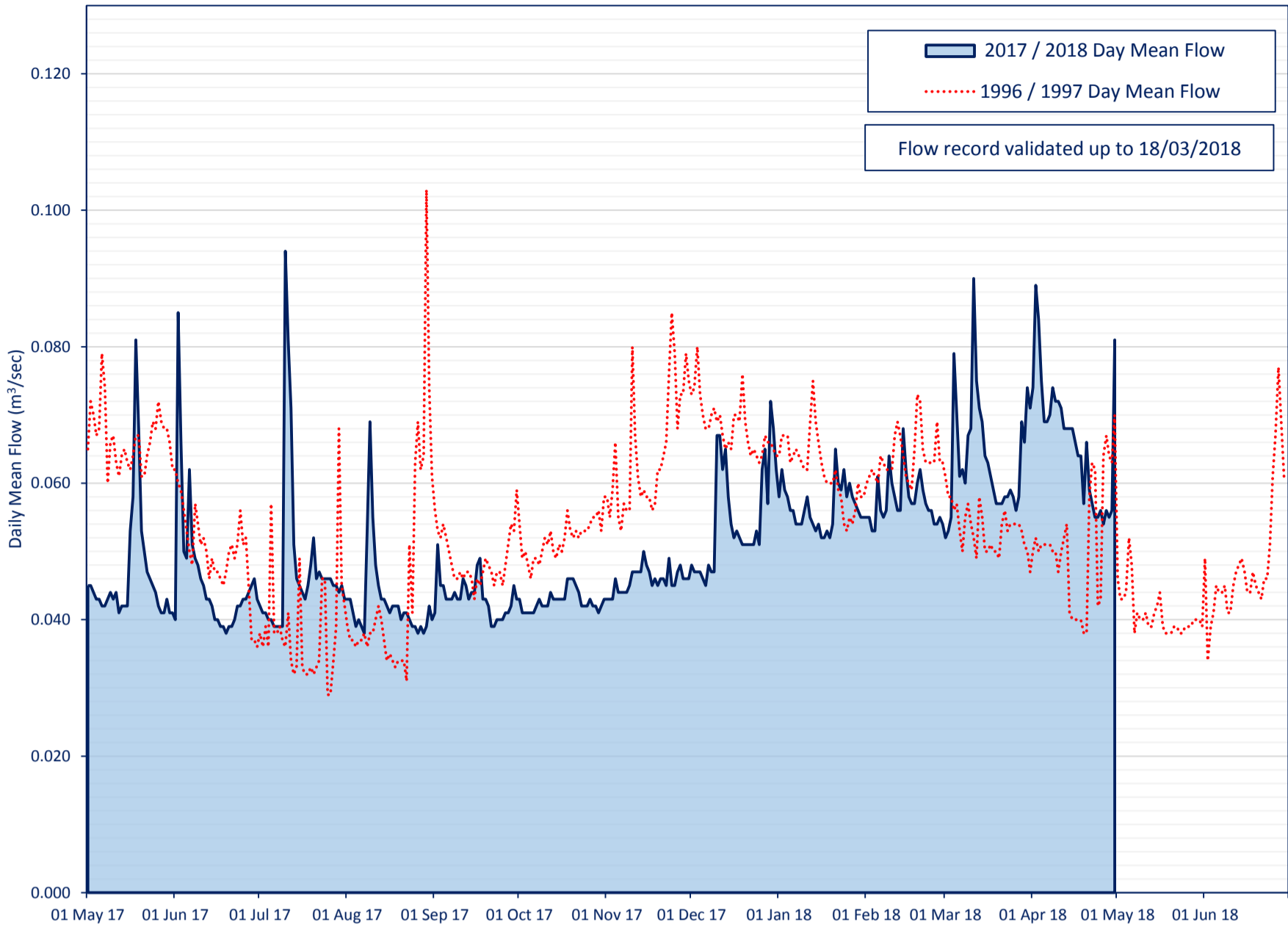
### River Gipping at Bramford (12 Month Hydrograph)



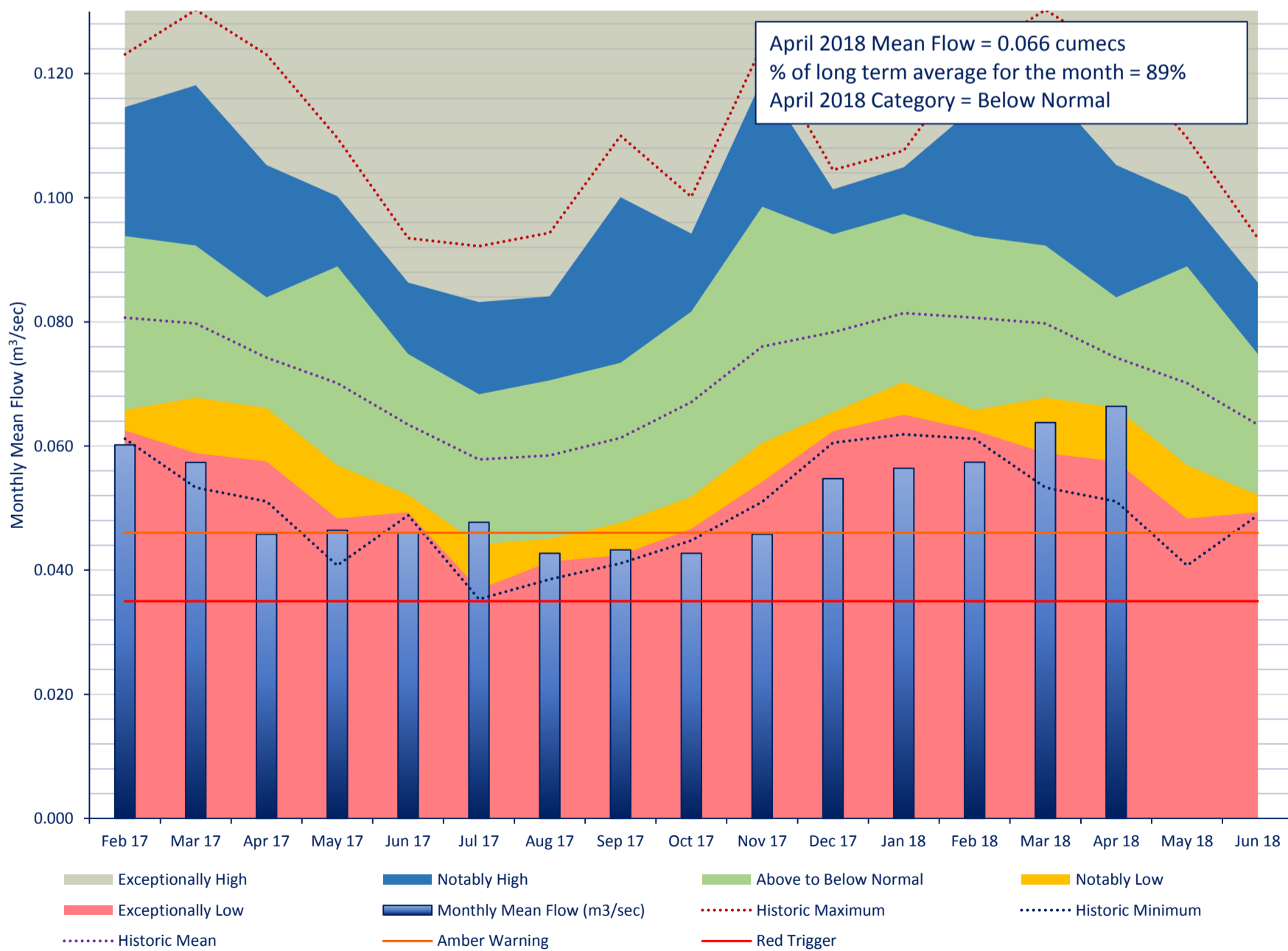
### River Gipping at Bramford Flow Categorisation 1970-2012 (Featured Years - 2017 to 2018)



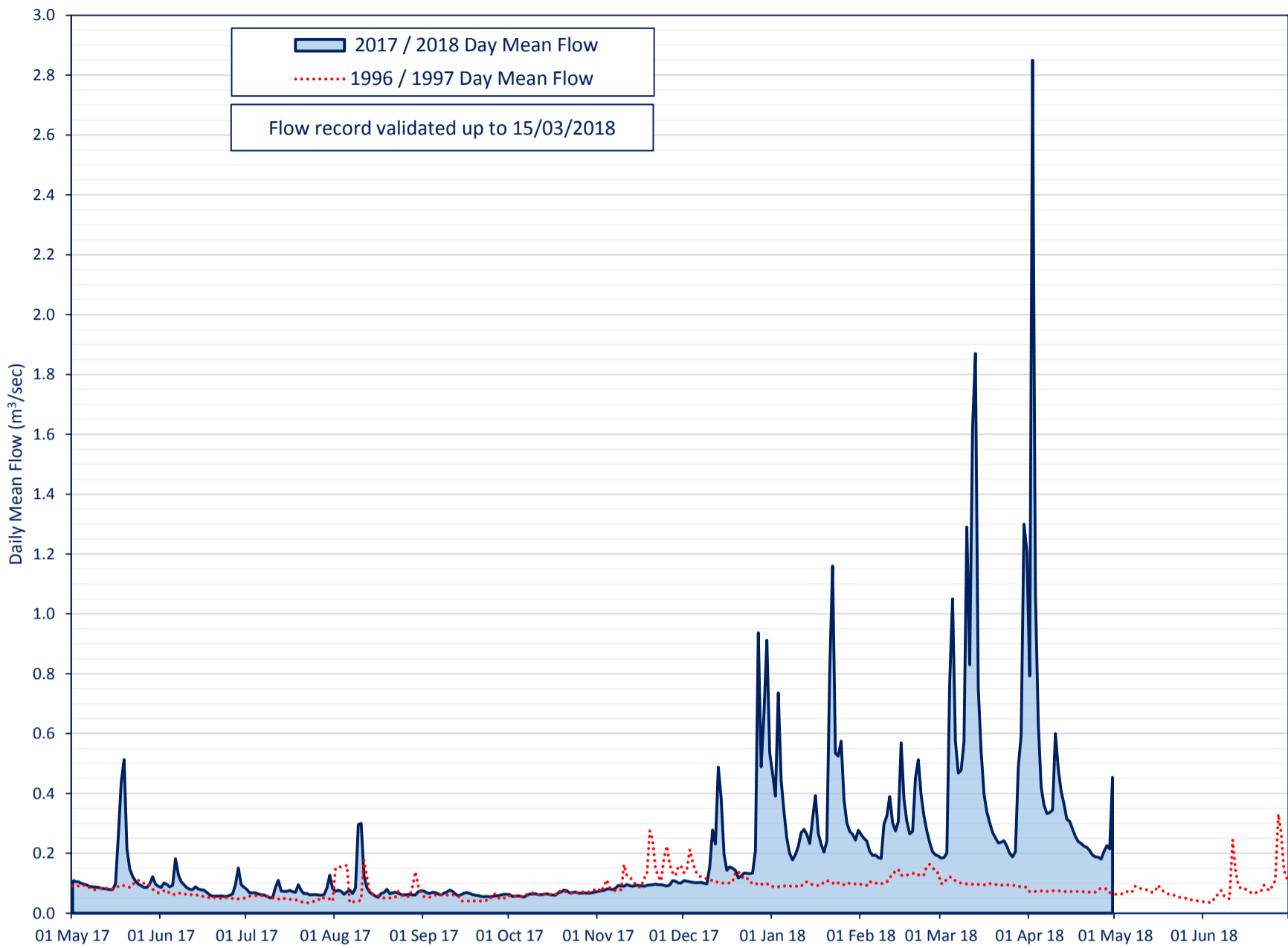
Black Ditch at Hollesley (12 Month Hydrograph)



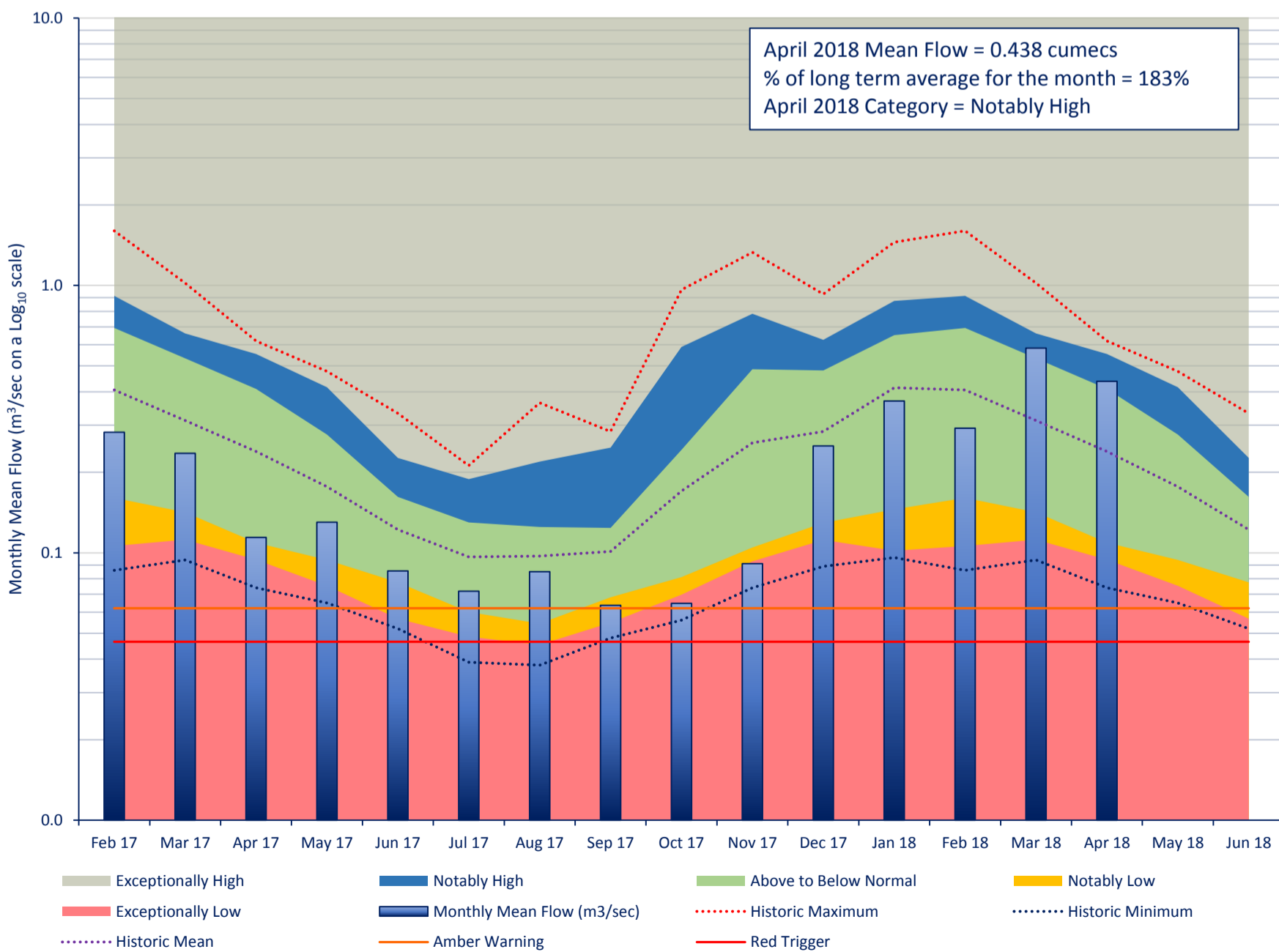
Black Ditch at Hollesley Flow Categorisation 1995-2016 (Featured Years - 2017 to 2018)



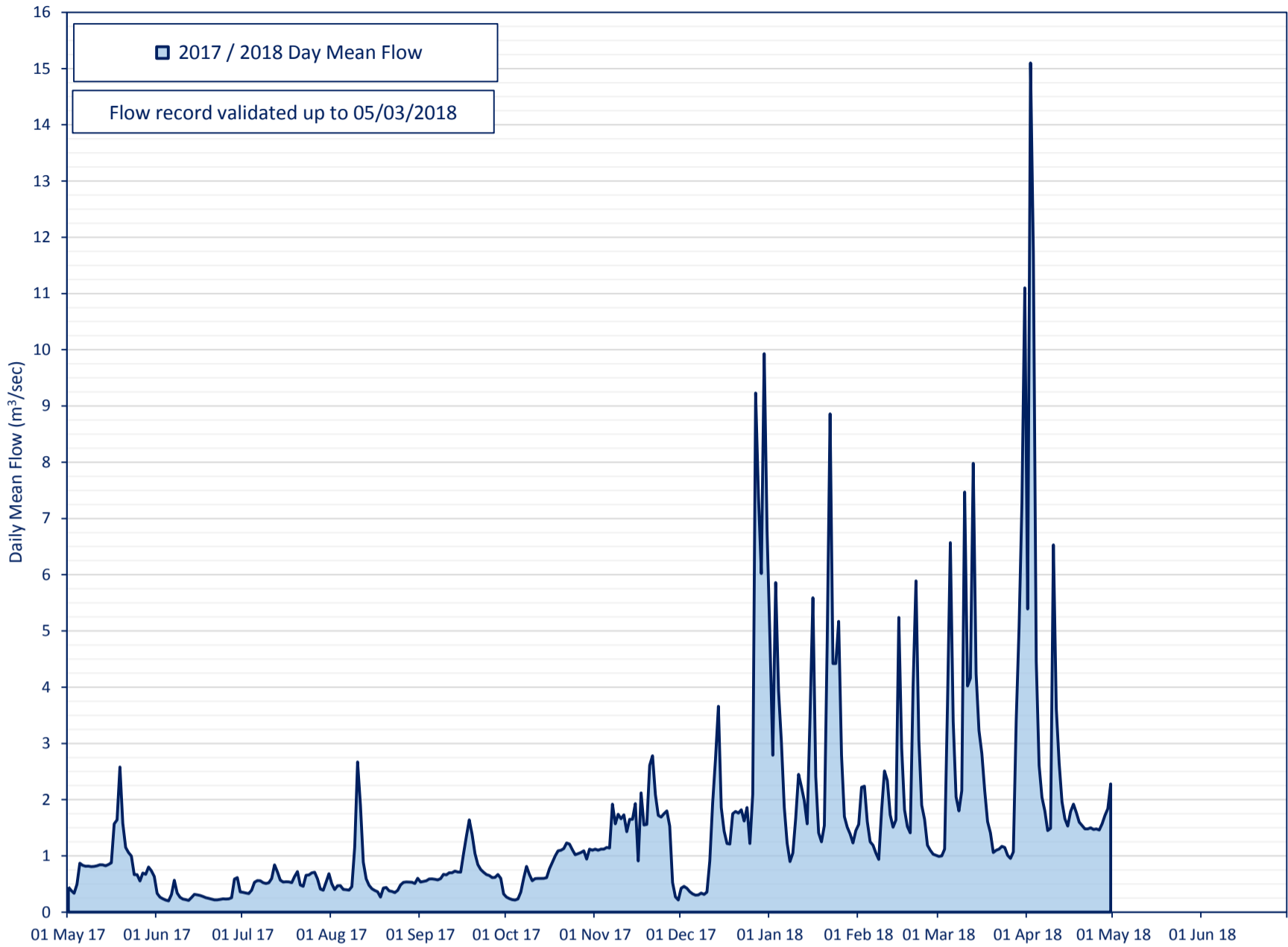
River Box at Polstead (12 Month Hydrograph)



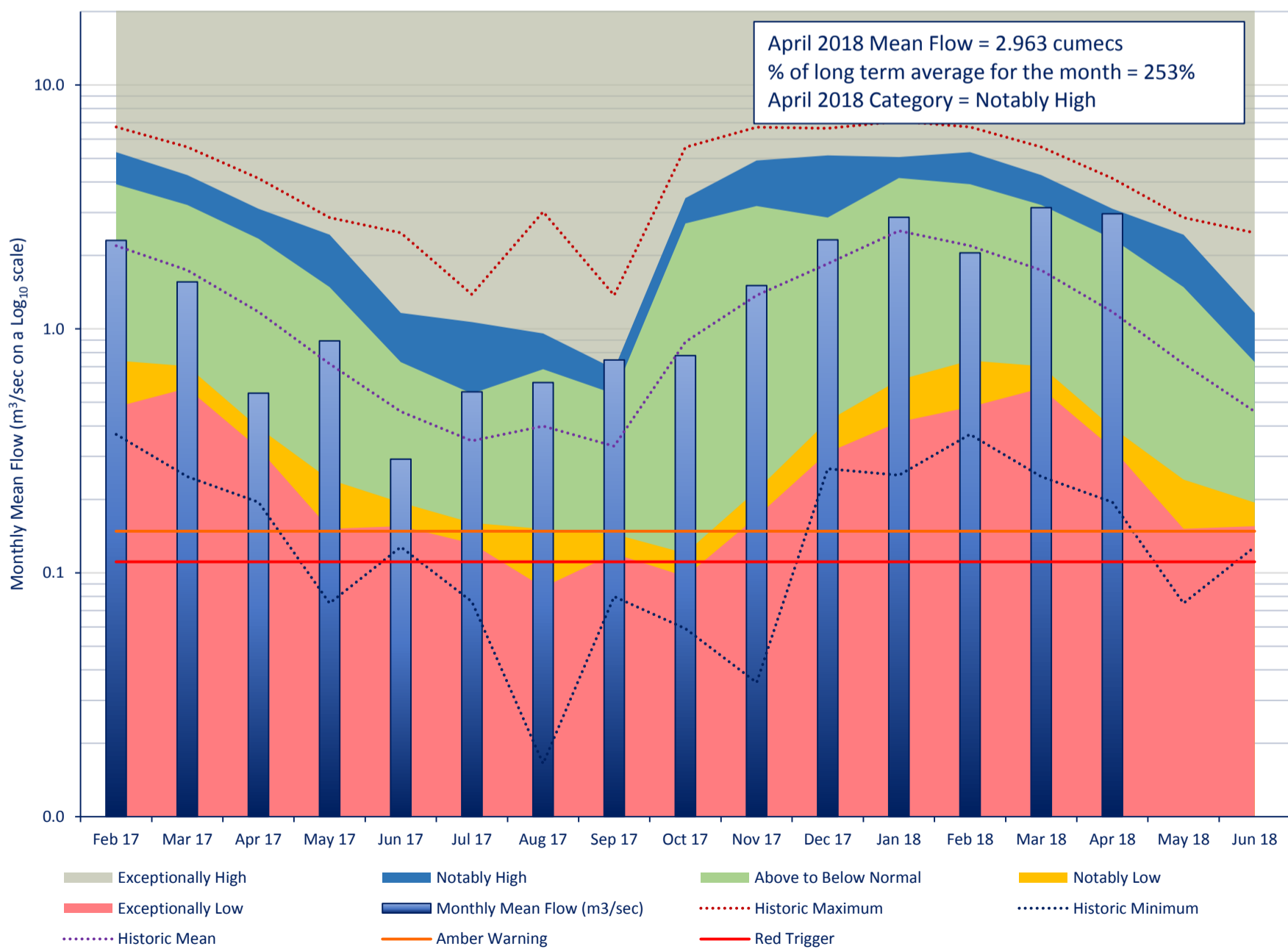
River Box at Polstead Flow Categorisation 1970-2012 (Featured Years - 2017 to 2018)



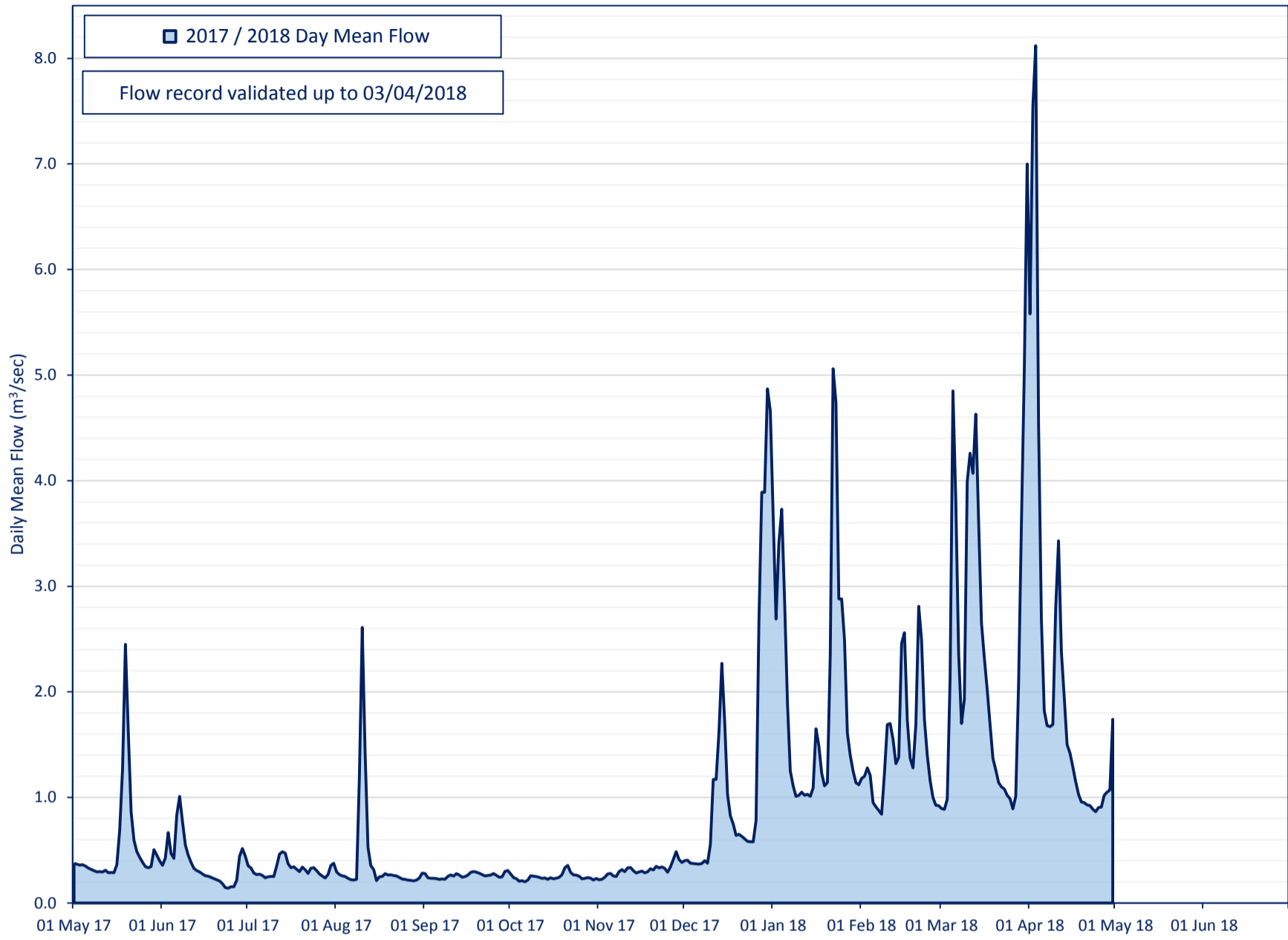
River Stour at Westmill (12 Month Hydrograph)



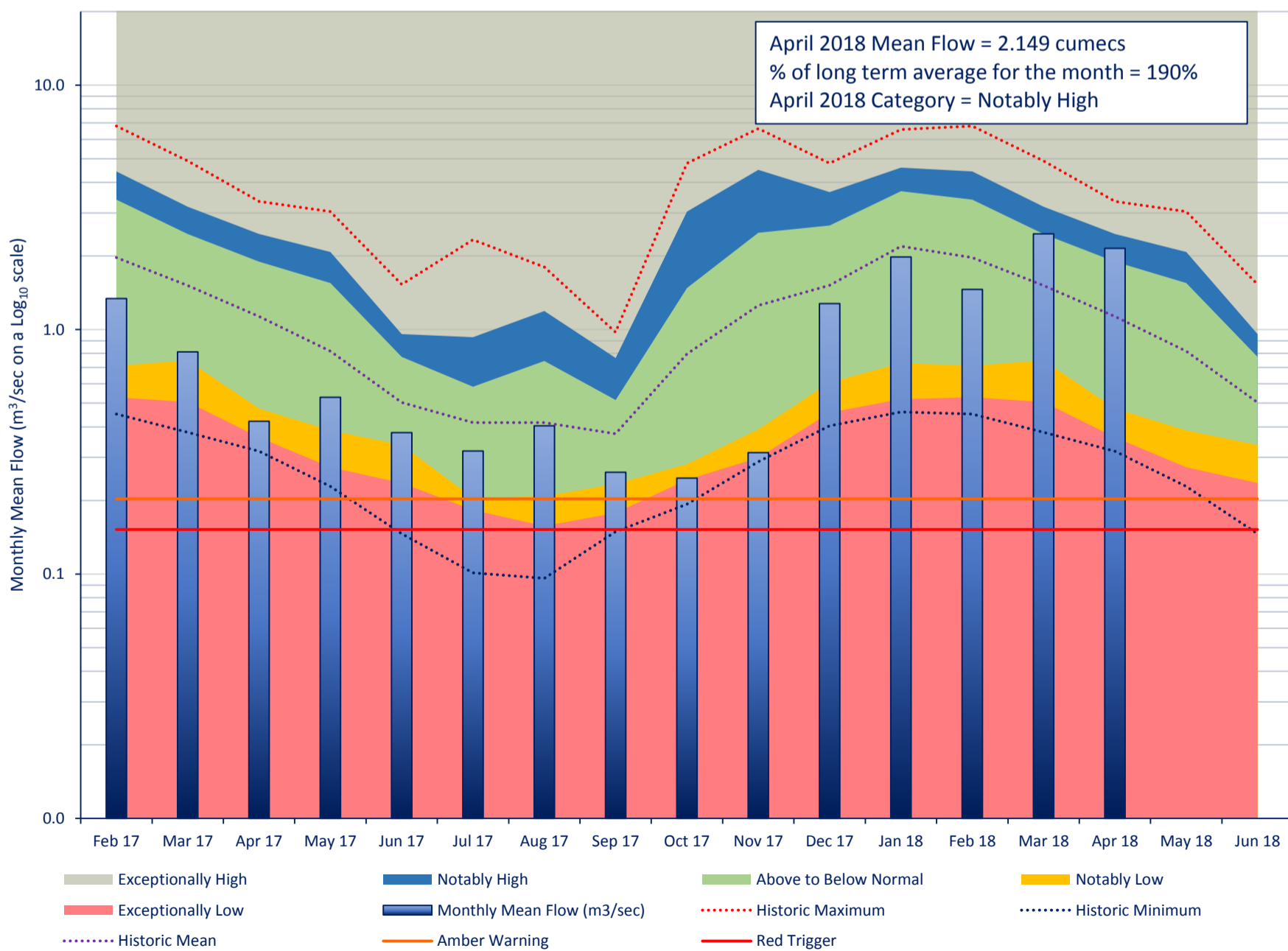
River Stour at Westmill Flow Categorisation 1970-2012 (Featured Years - 2017 to 2018)



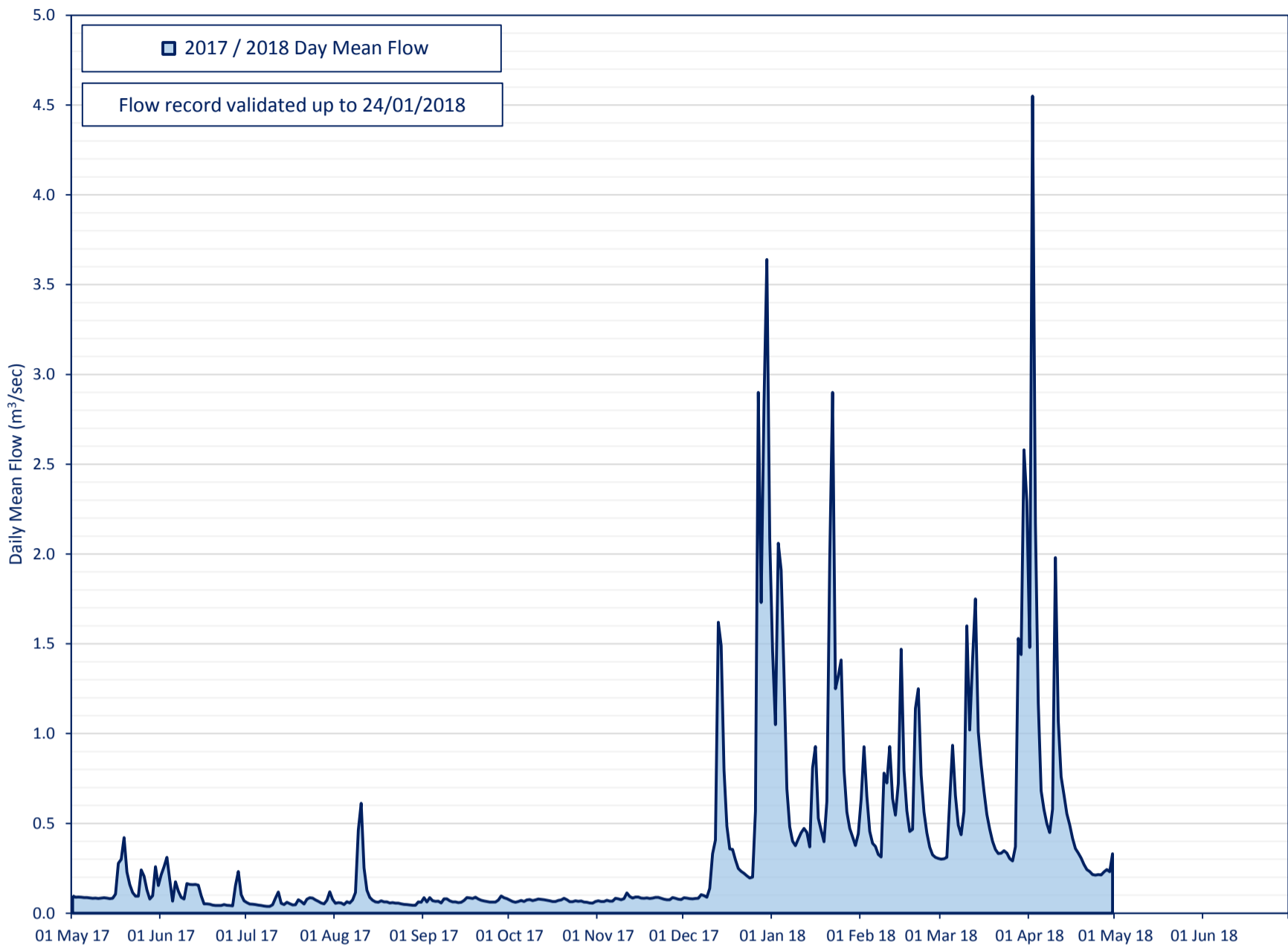
River Colne at Lexden (12 Month Hydrograph)



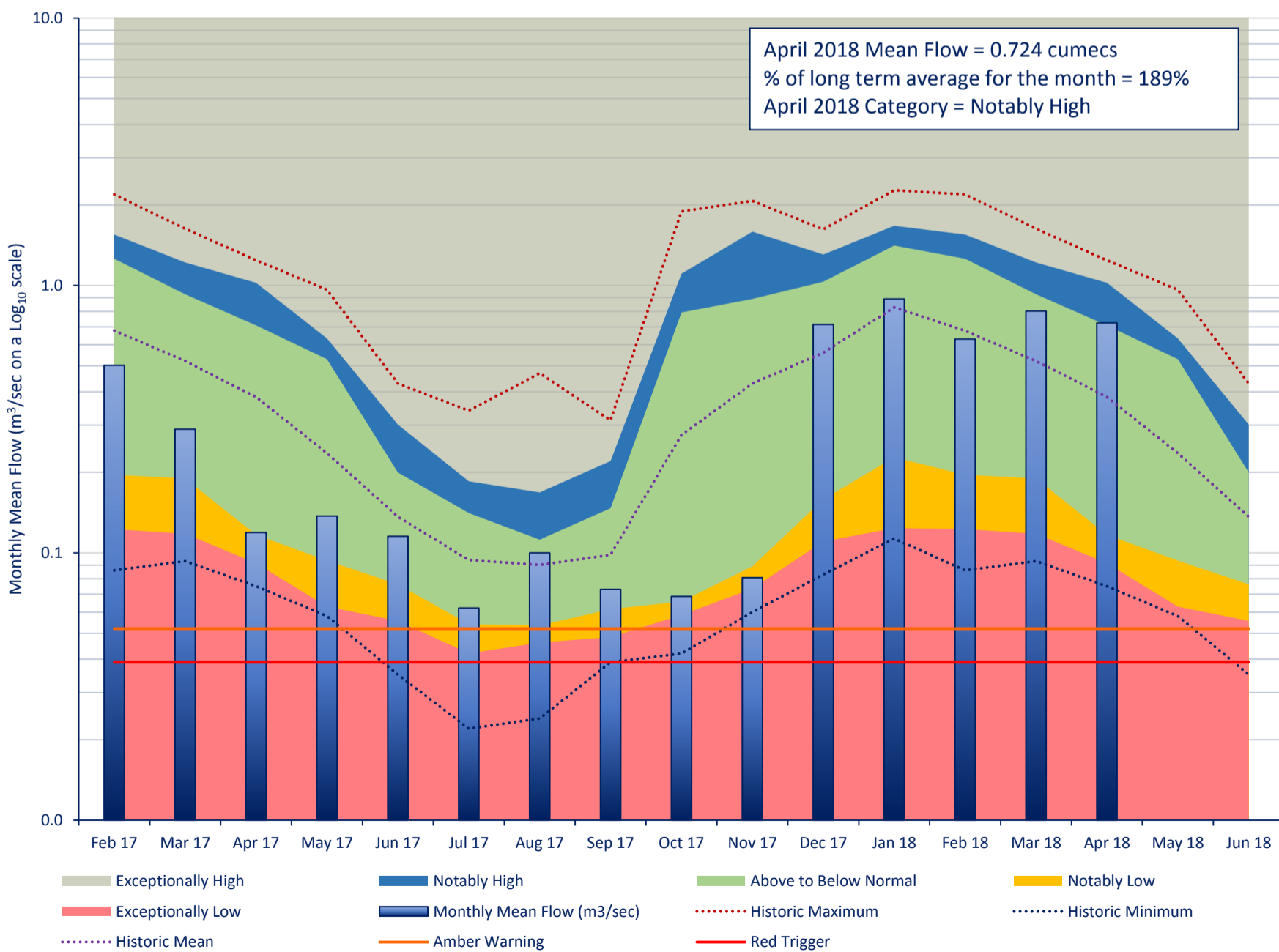
River Colne at Lexden Flow Categorisation 1970-2012 (Featured Years - 2017 to 2018)



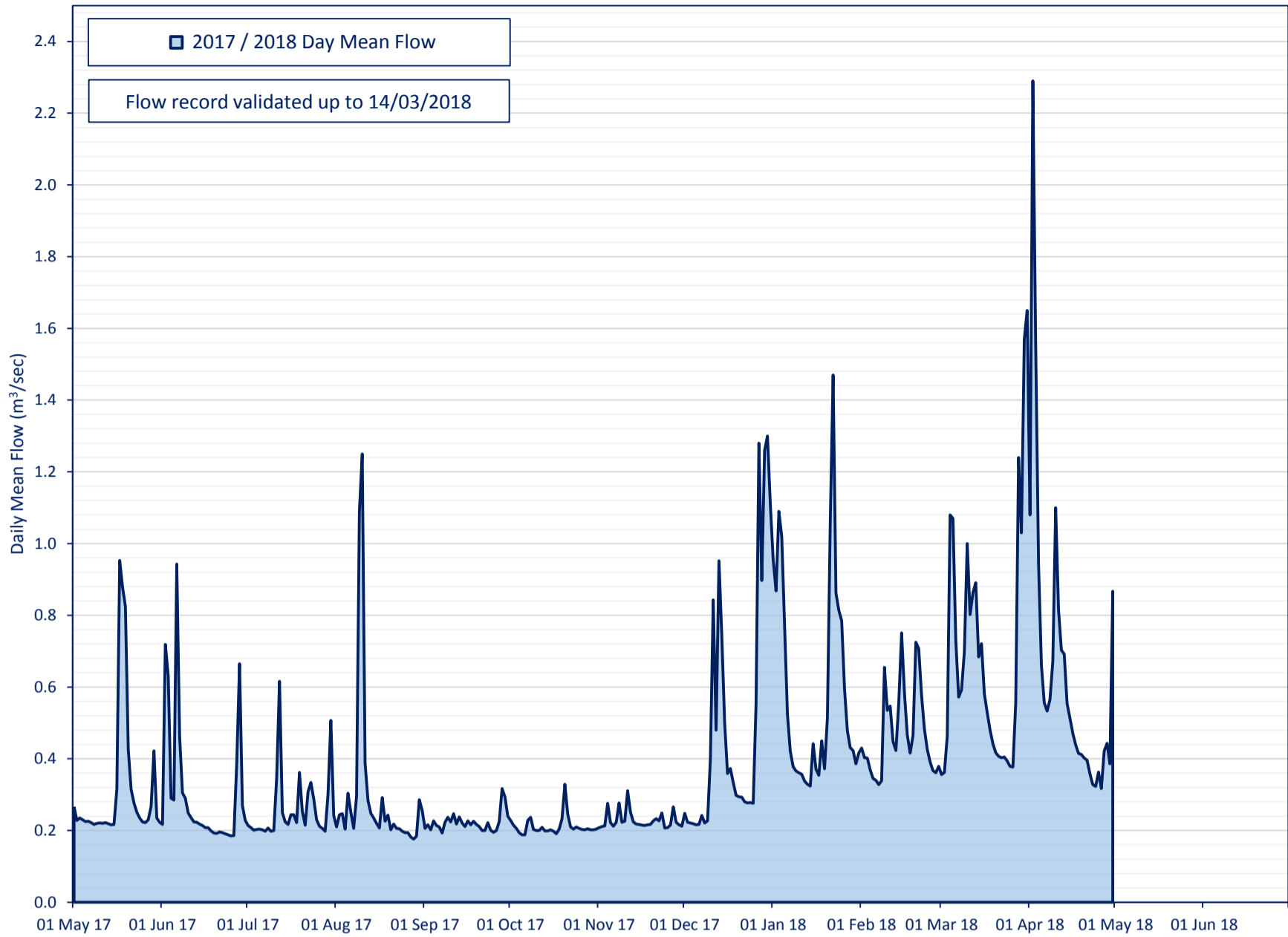
River Chelmer at Churchend (12 Month Hydrograph)



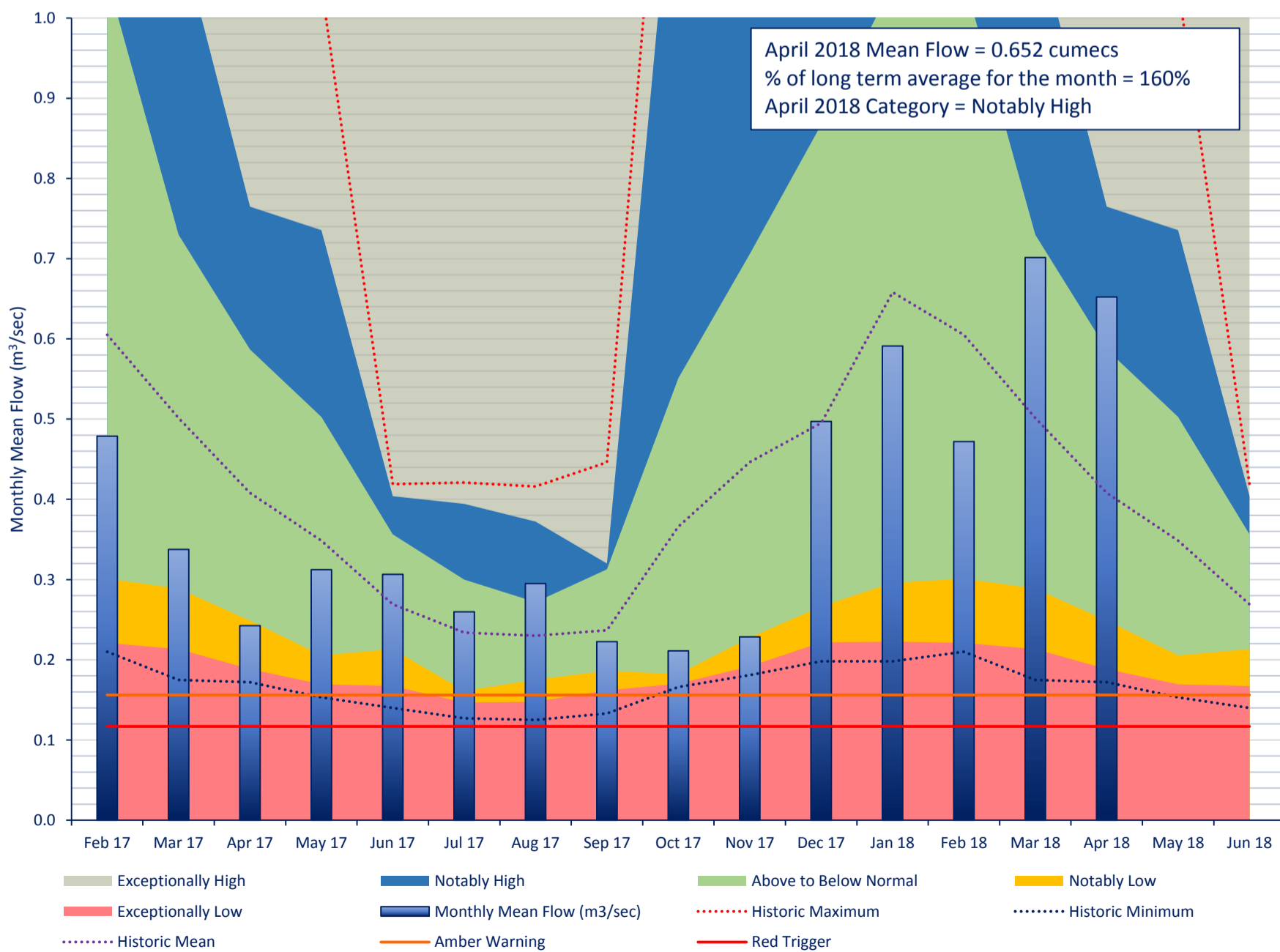
River Chelmer at Churchend Flow Categorisation 1970-2012 (Featured Years - 2017 to 2018)



River Brain at Guithavon Valley (12 Month Hydrograph)

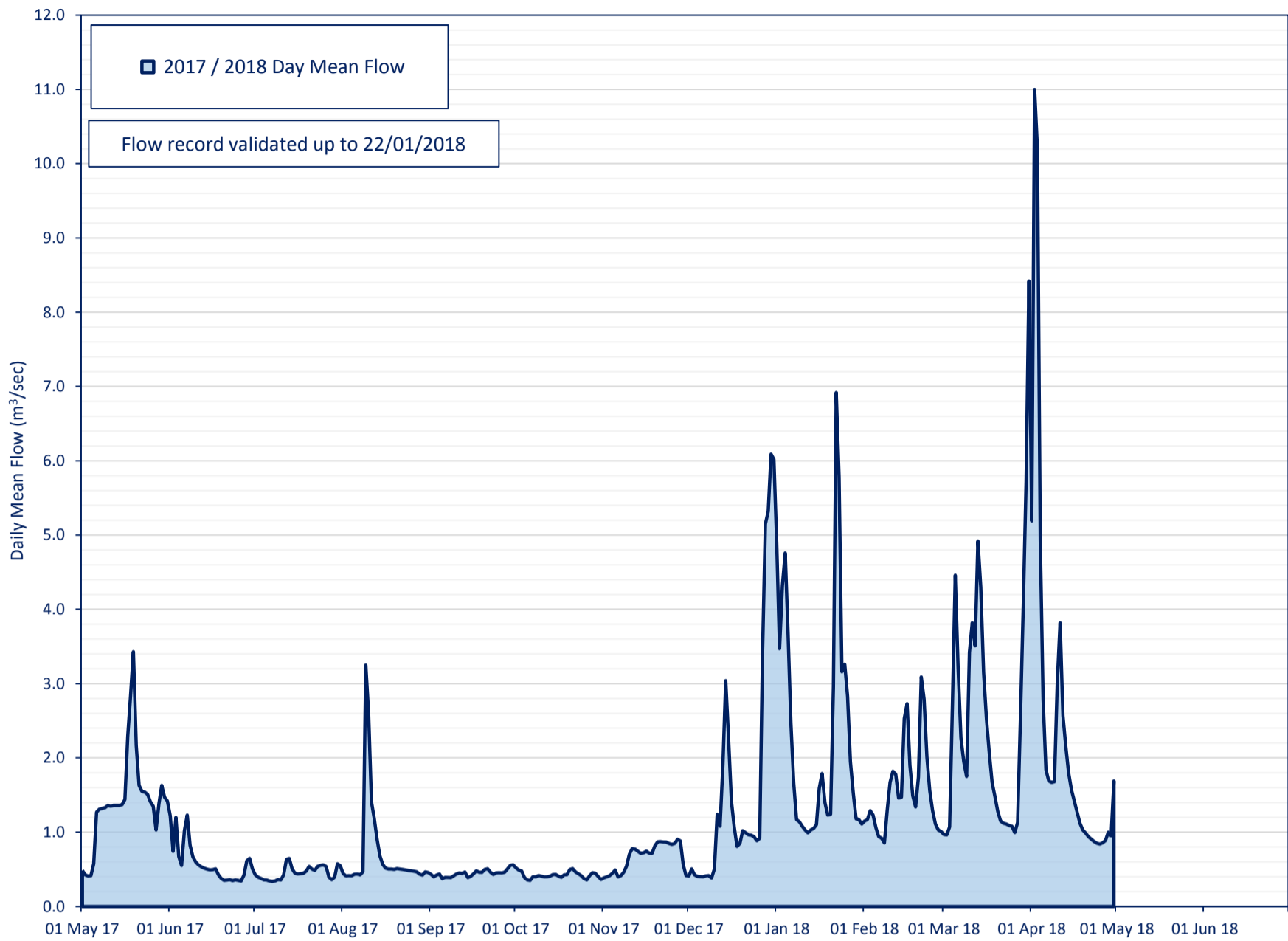


River Brain at Guithavon Valley Flow Categorisation 1970-2012 (Featured Years - 2017 to 2018)

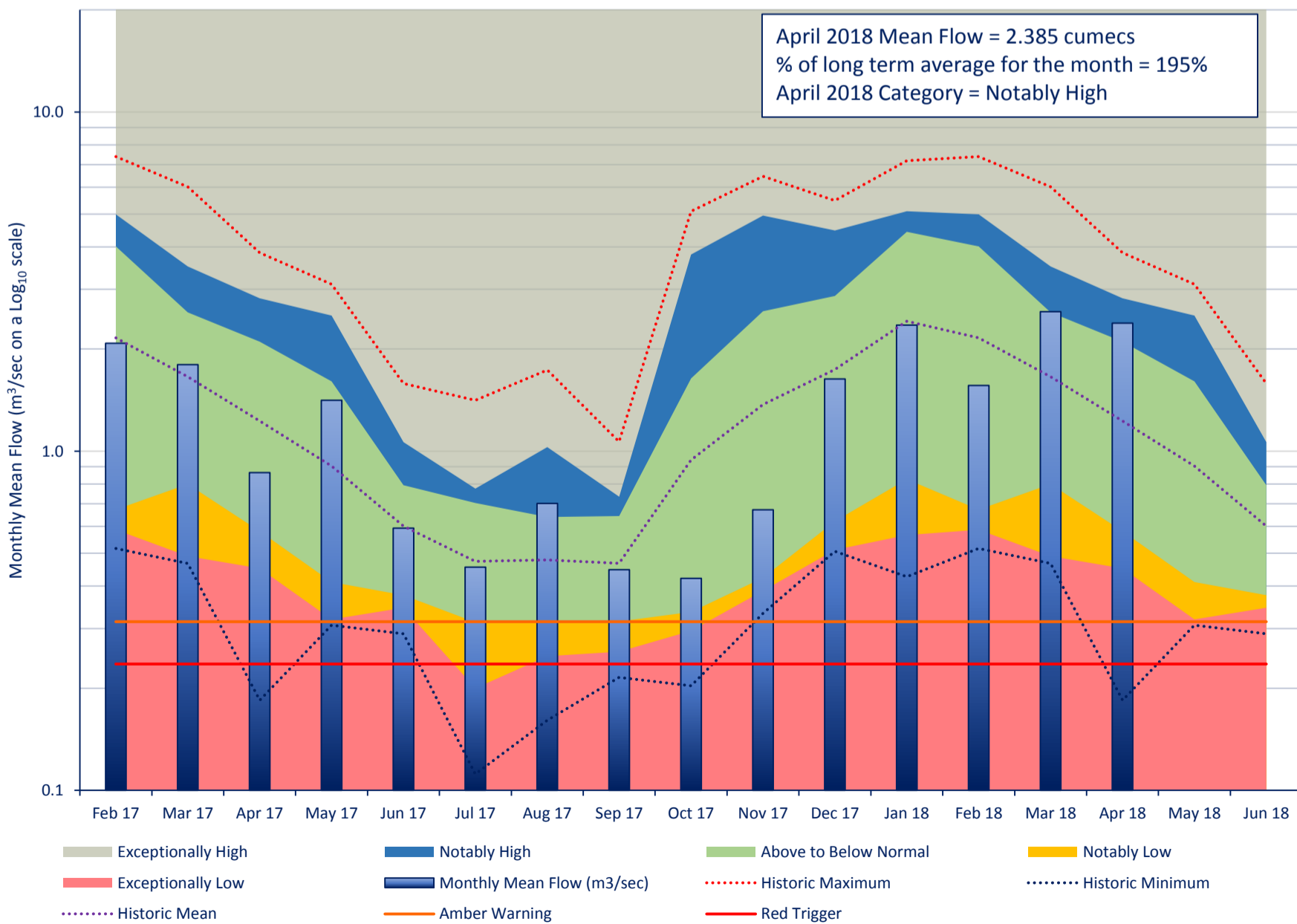




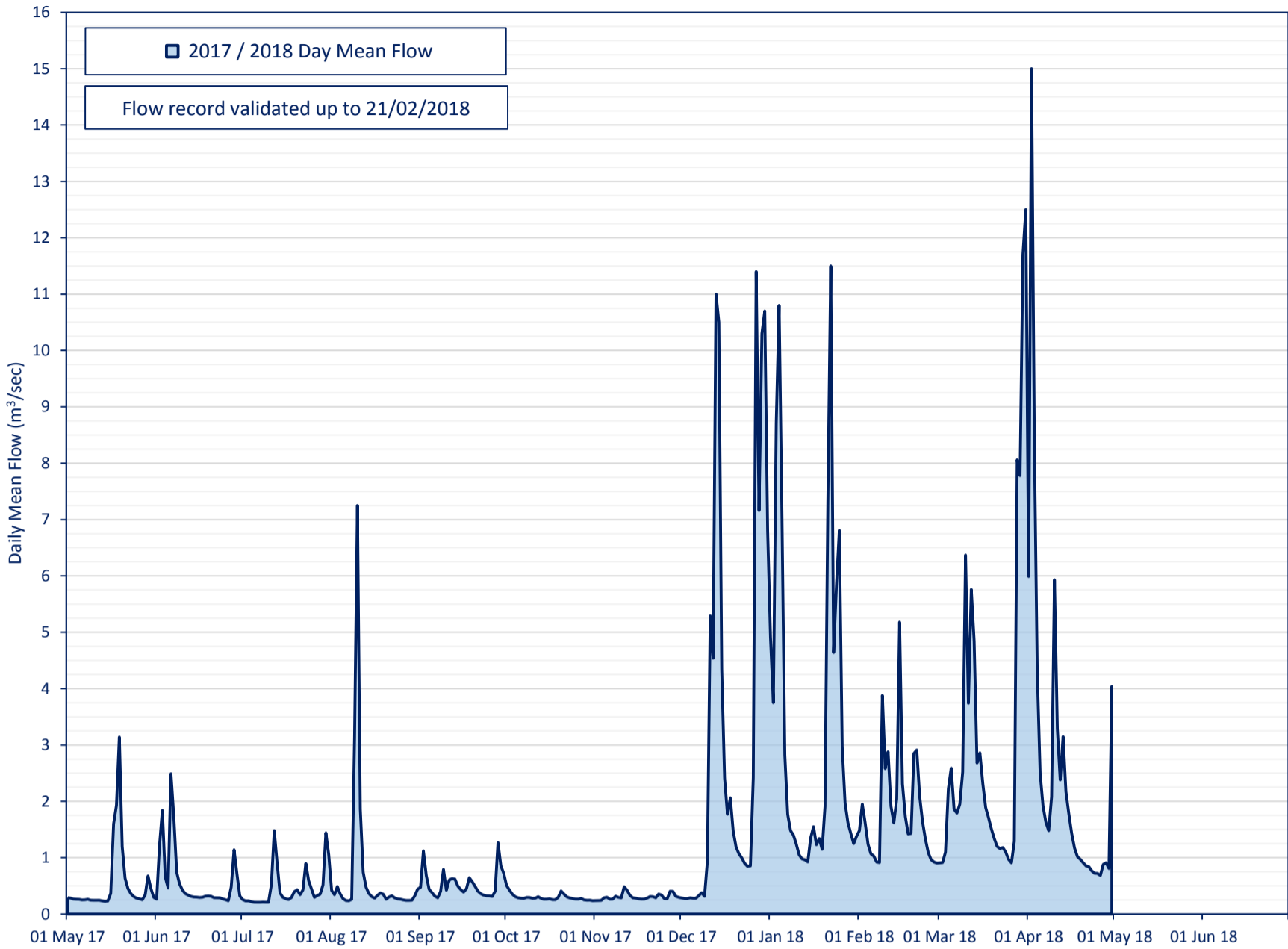
River Blackwater at Appleford Bridge (12 Month Hydrograph)



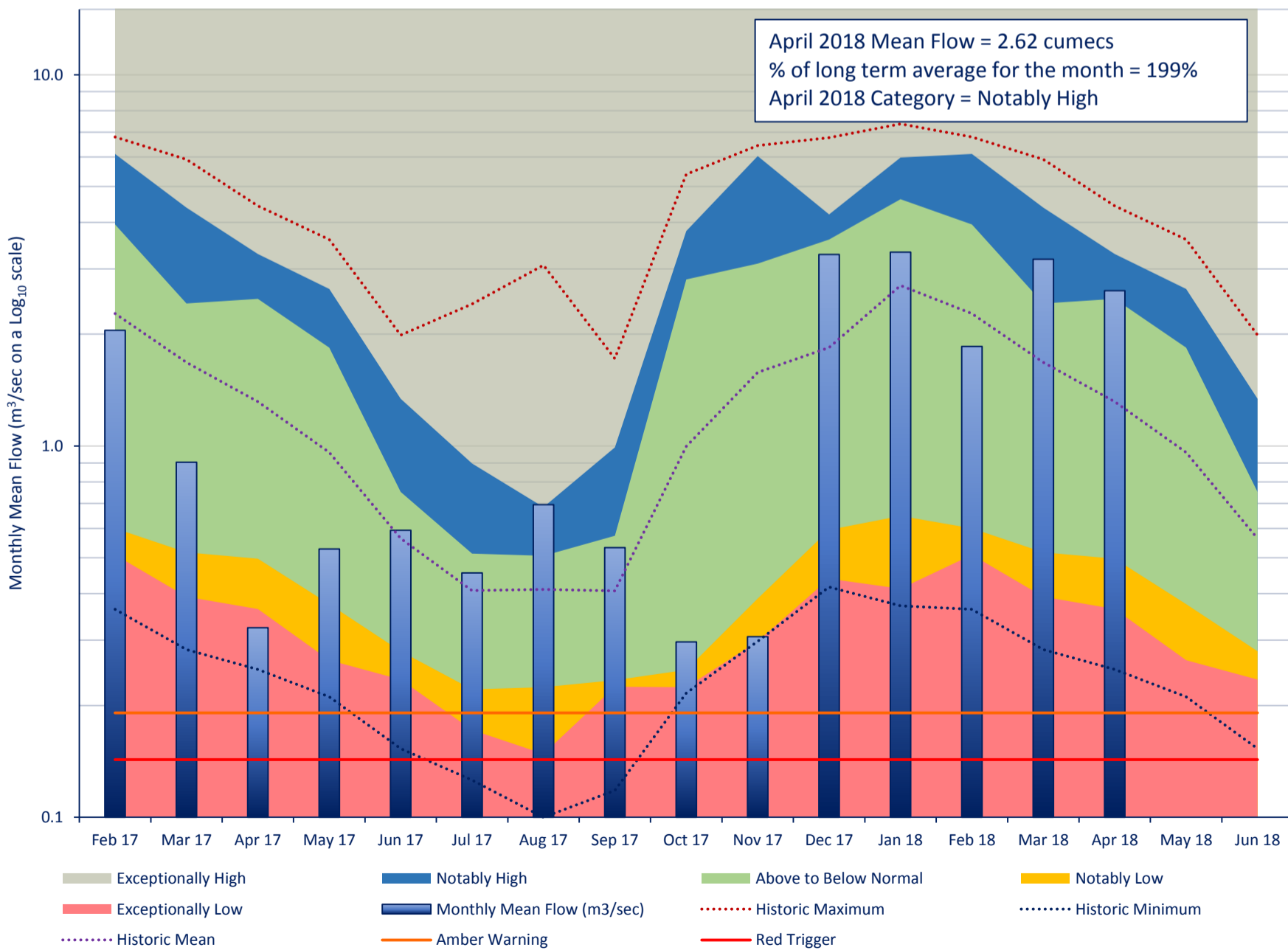
River Blackwater at Appleford Bridge Flow Categorisation 1970-2012 (Featured Years - 2017 to 2018)



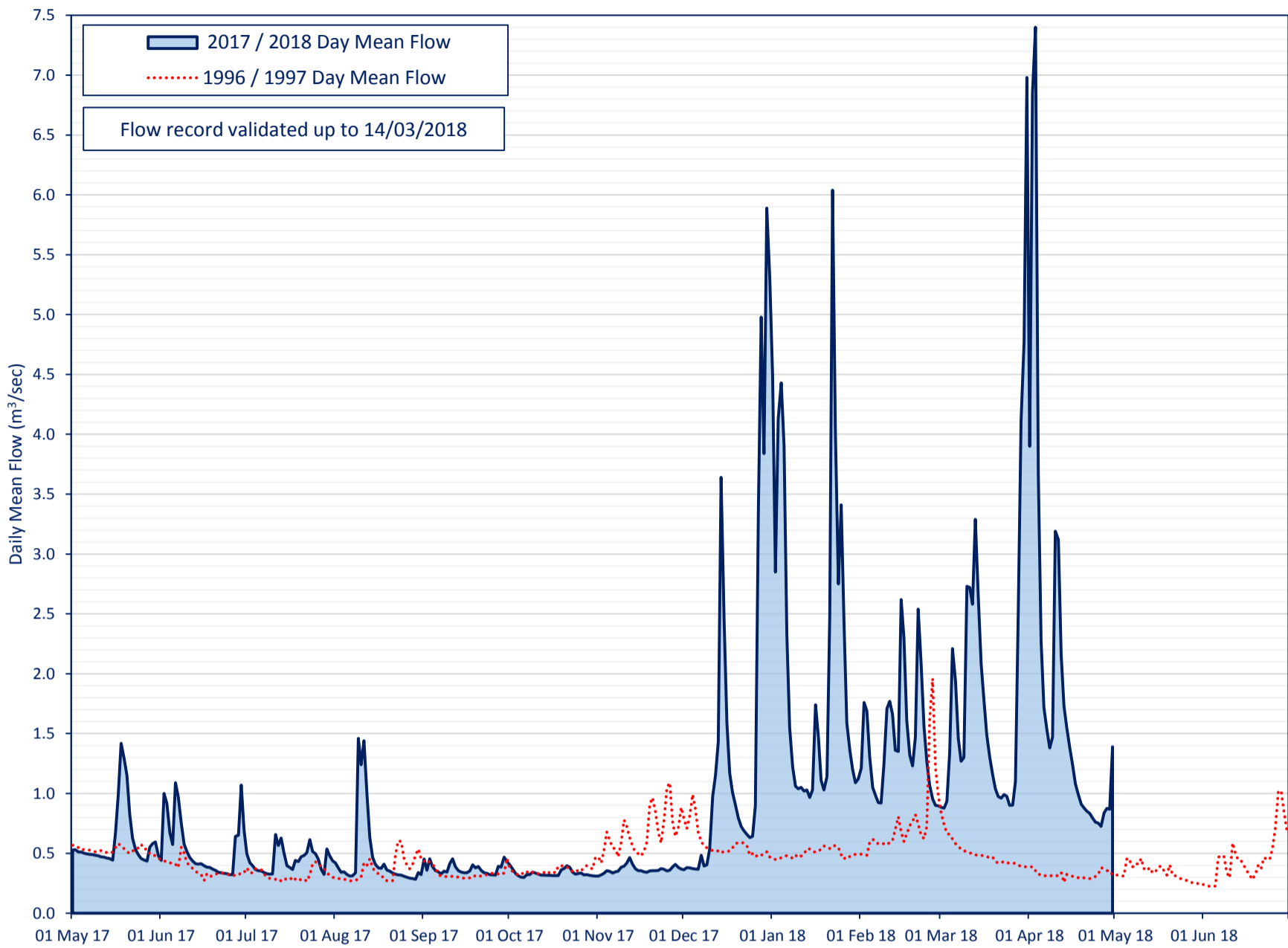
River Can at Beaches Mill (12 Month Hydrograph)



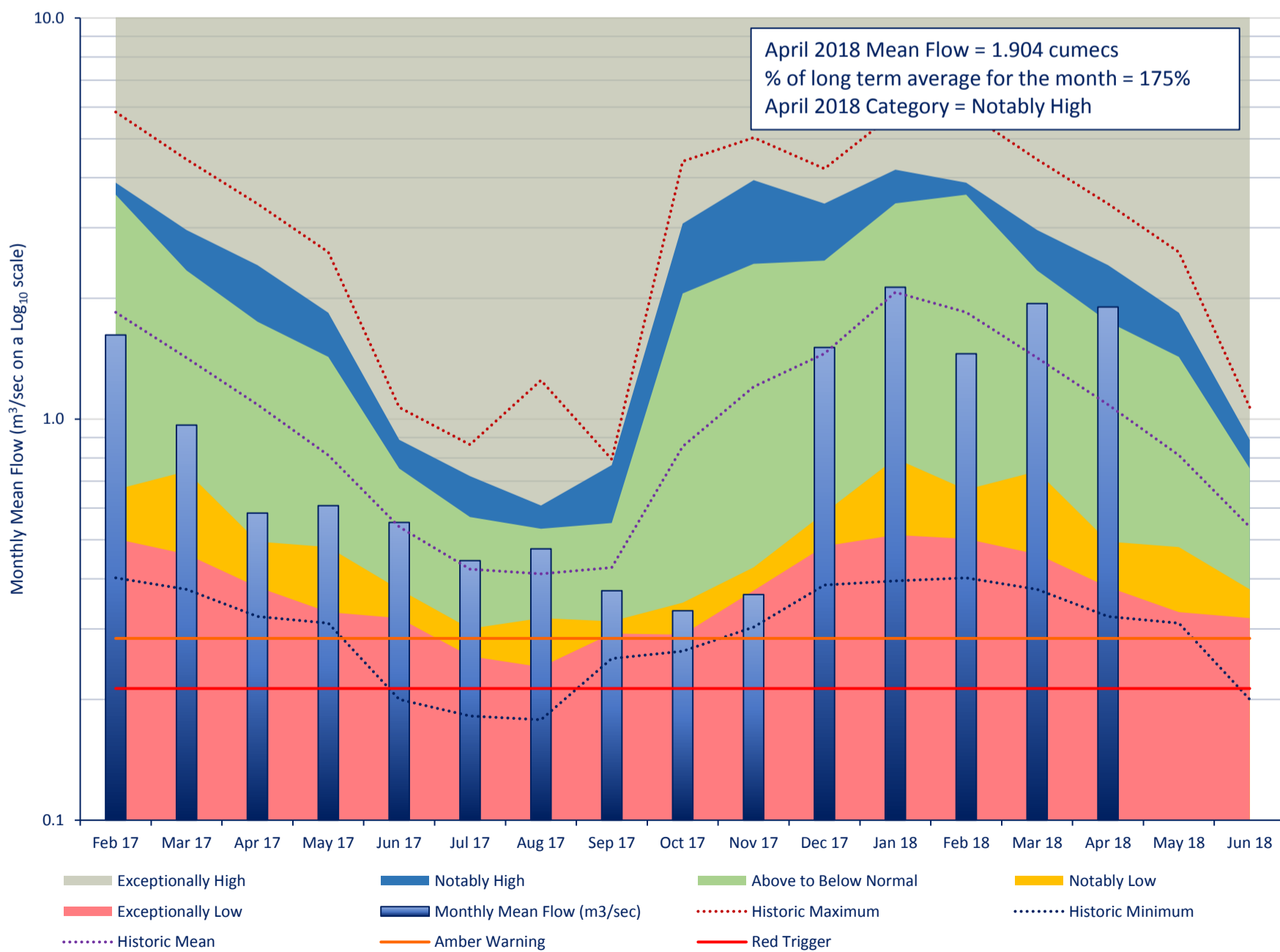
River Can at Beaches Mill Flow Categorisation 1970-2012 (Featured Years - 2017 to 2018)



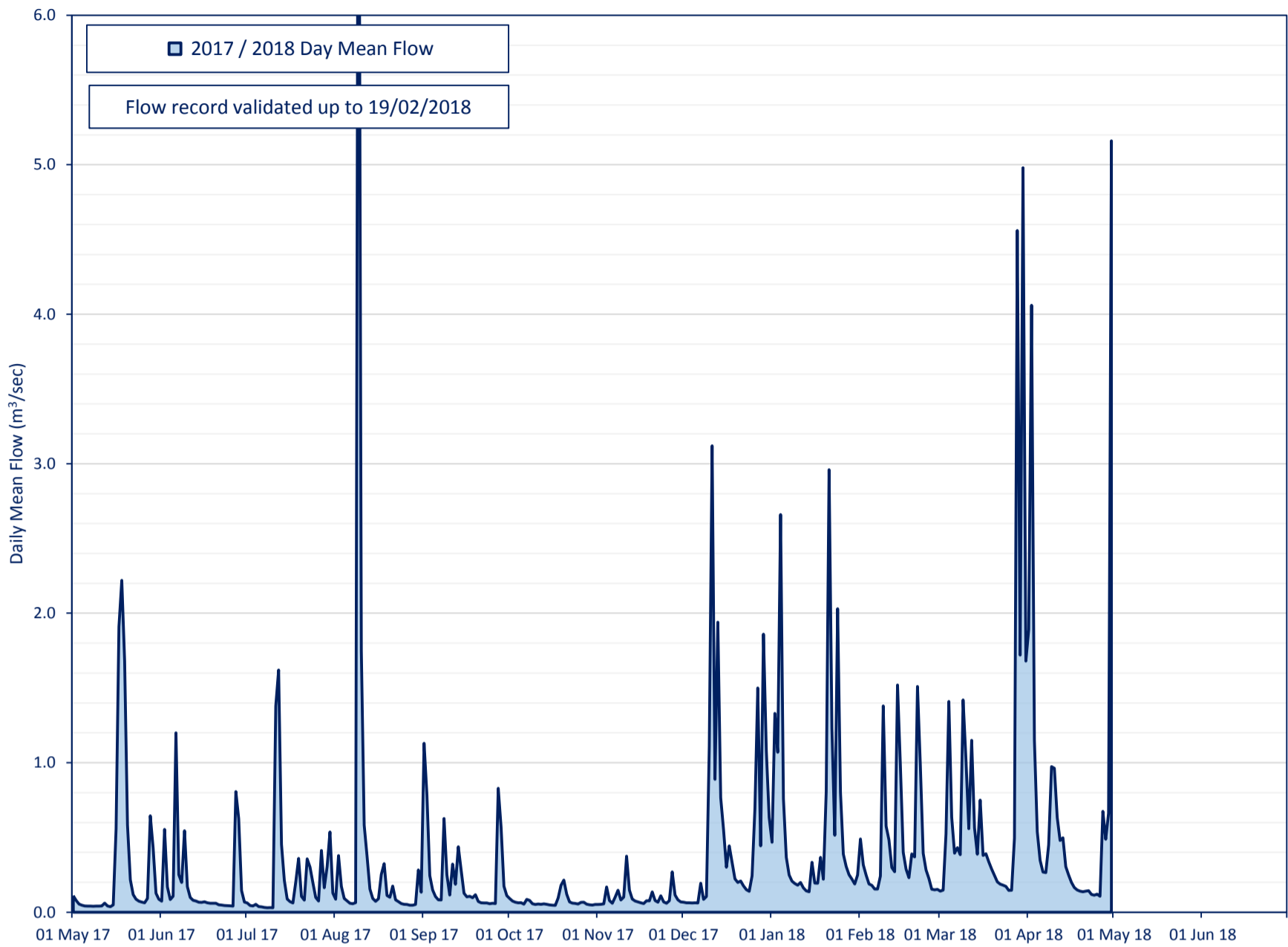
River Chelmer at Springfield (12 Month Hydrograph)



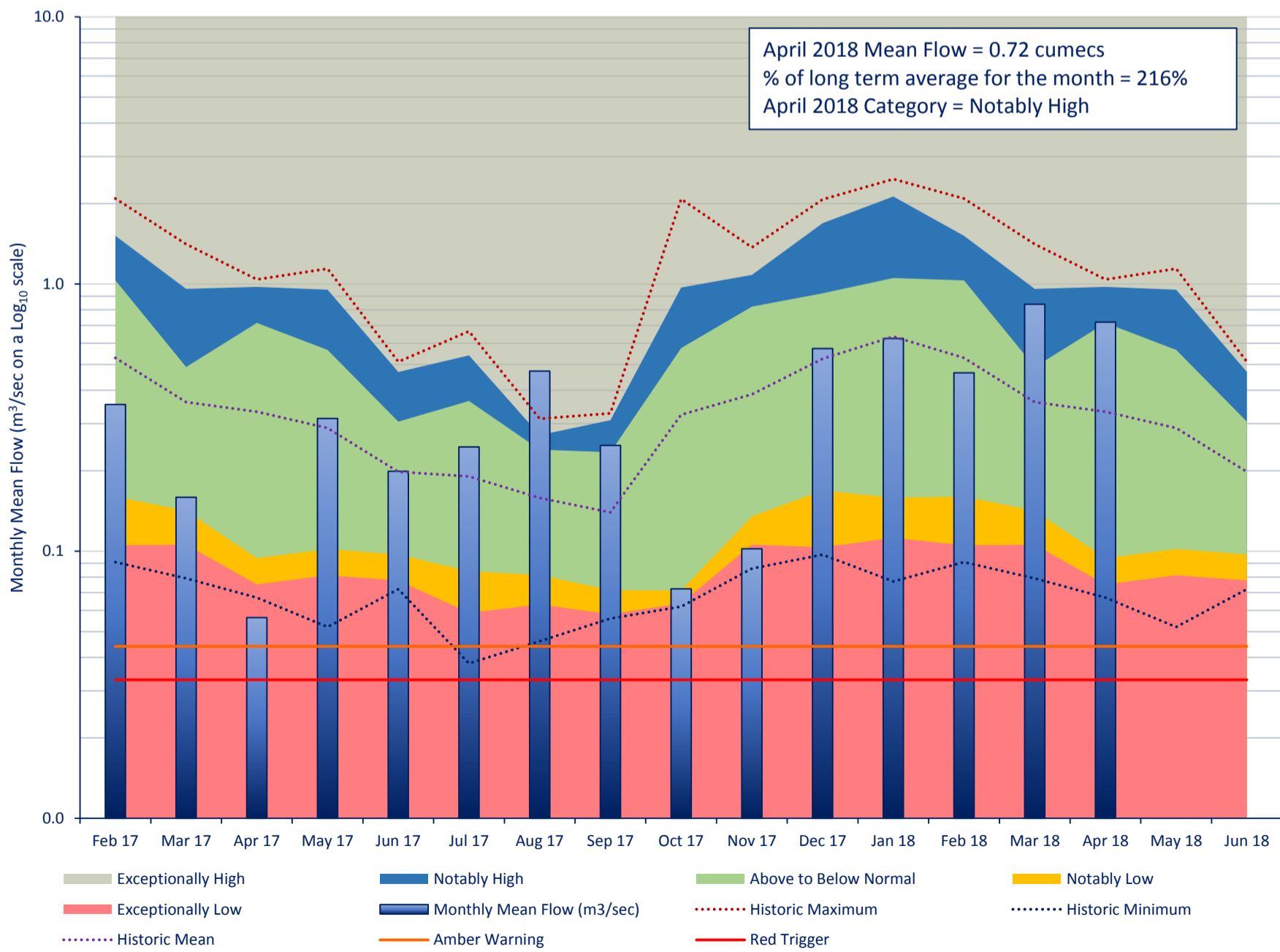
River Chelmer at Springfield Flow Categorisation 1970-2012 (Featured Years - 2017 to 2018)



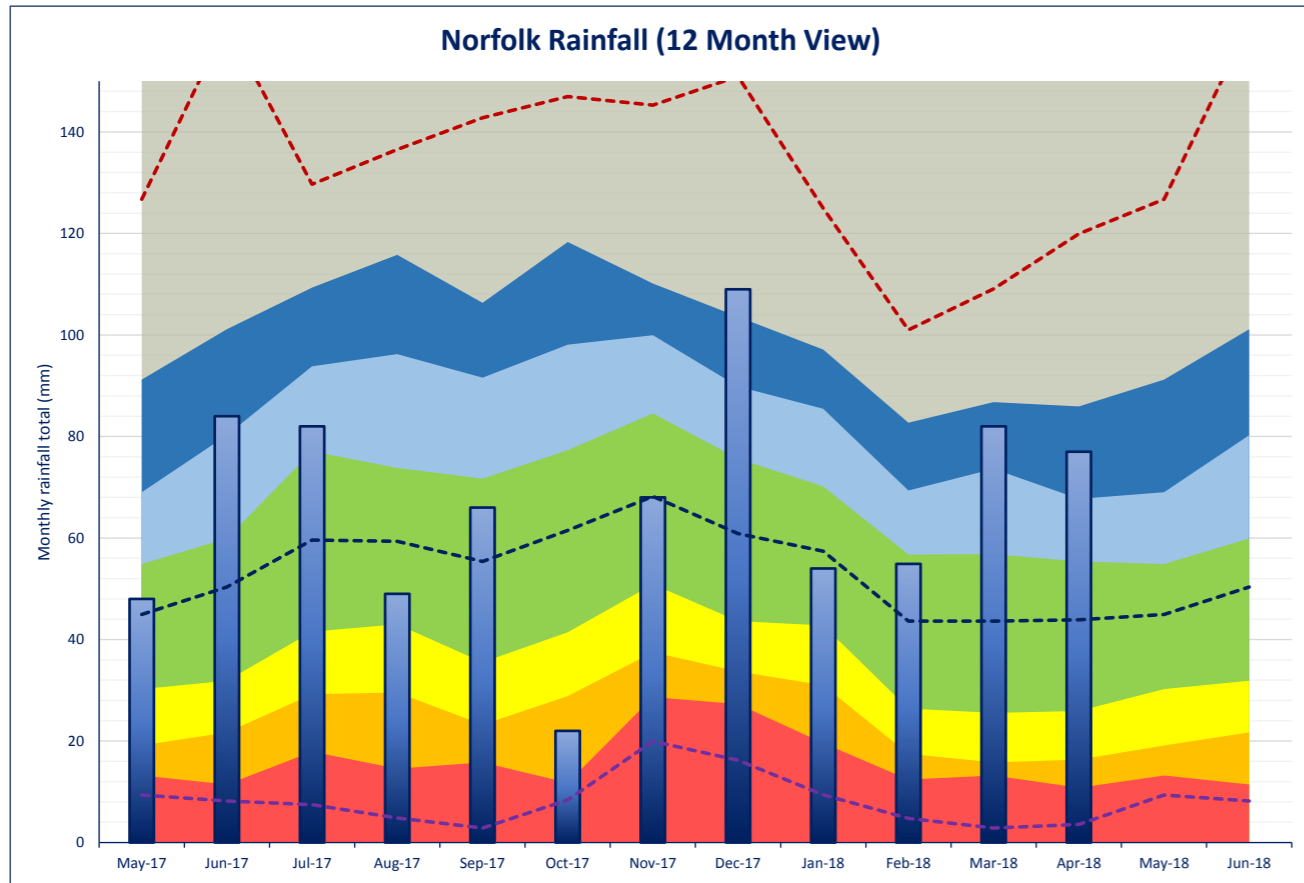
River Crouch at Wickford (12 Month Hydrograph)



River Crouch at Wickford Flow Categorisation 1970-2012 (Featured Years - 2017 to 2018)



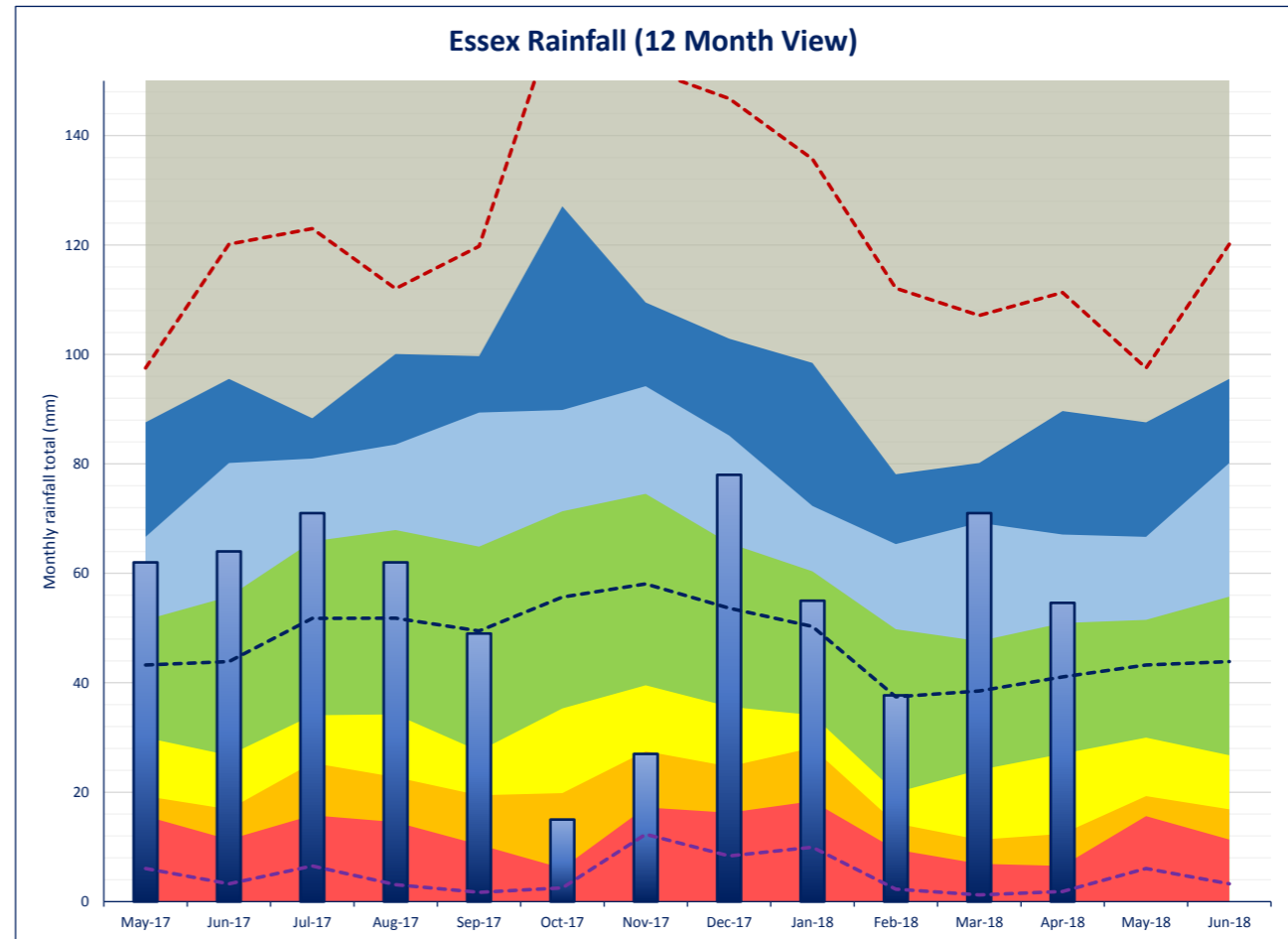
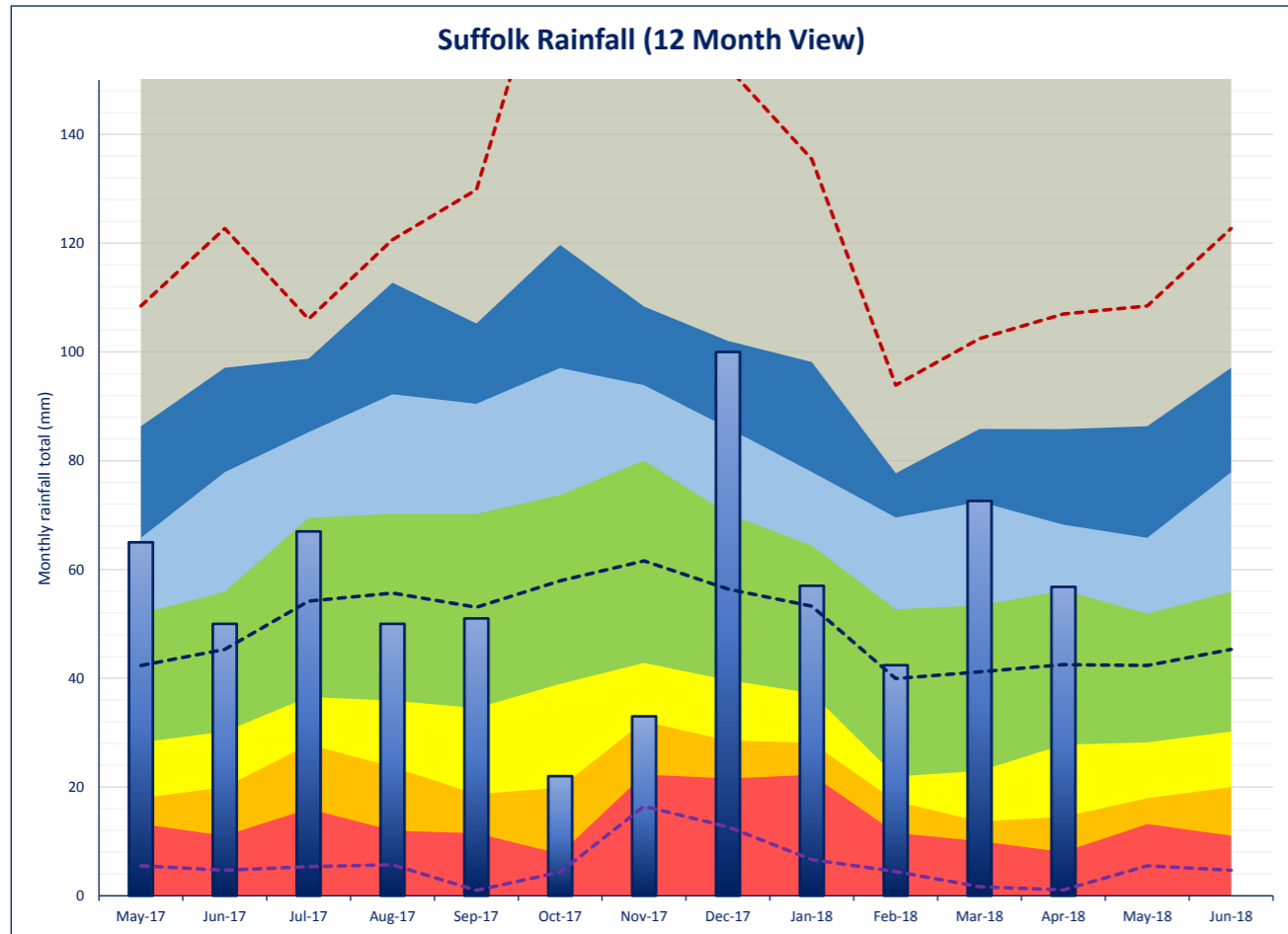
# County Rainfall Graphs



### Chart Legend:

- Exceptionally High
- Notably High
- Above Normal
- Normal
- Below Normal
- Notably Low
- Exceptionally Low
- Monthly Total (mm)
- Average
- Max
- Min

	Norfolk	Suffolk	Essex
<b>Current Month</b>			
April 2018 Rainfall	77mm	57mm	55mm
% of Long Term Average	175%	134%	133%
Category	Notably High	Above Normal	Above Normal
<b>3 Month Summary</b>			
February 2018 to April 2018			
3 month total	214mm	172mm	163mm
% of Long Term Average	163%	139%	140%
<b>6 Month Summary</b>			
November 2017 to April 2018			
6 month total	445mm	362mm	323mm
% of Long Term Average	140%	123%	116%
<b>12 Month Summary</b>			
May 2017 to April 2018			
12 month total	796mm	667mm	646mm
% of Long Term Average	123%	111%	112%



## Deviation from Monthly Average Rainfall

- Chart Legend:**
- Serious Drought
  - Drought
  - Developing Drought
  - Normal
  - Deviation from average rainfall (mm)
  - Deviation from average rainfall exc. May to Sept (mm)

**Summary for April 2018:**

	Norfolk	Suffolk	Essex
Current rainfall deficit or surplus	71mm	-64mm	-48mm
Drought status	Normal	Normal	Normal
Current rainfall deficit or surplus (excluding May to September)	12mm	-96mm	-115mm

Rainfall deficit or surplus values apply to a common start date of September 2016. Indicative drought triggers are based on observed cumulative rainfall in the run up to historic drought events.

