Soaps and Detergents

1 P												2 C					
3 H	Y	D	R	O	P	4 H	I	L	I	C		A					
O						Y						L					
5 S	O	A	6 P			D						C					
P			7 H	Y	D	R	O	P	8 H	O	B	I	C		9 H		
H			O			O			Y			U			Y		
A			S			P			D			M			D		
T			P			H			R				10 H	A	R	D	
E			H			I		11 S	O	A	P				O		
			A			L			X						X		
12 S	O	F	T			I			I						I		
			E			C			D		13 C		14 O		D		
								15 N	E	G	A	T	I	V	E		
											L		L				
	16 H	Y	D	R	O	P	H	O	B	I	C						
	A										I						
	R										U						
	17 D	E	T	E	R	G	E	N	T		M						

Across

3. "Water-loving" and oil-repelling.[11]
5. Cleaning product made from vegetable oil and other chemicals.[4]
7. "Water-hating" and oil-attracting.[11]
10. Type of water that does not produce much lather.[4]
11. Personal cleaning product invented 200 years ago.[4]
12. Type of water that forms a lot of lather.[4]
15. Opposite of "positive".[8]
16. End of soap molecule that attracts dirt or grease but repels water.[11]
17. Household cleaning product.[9]

Down

1. Environmentally unfriendly chemical in cleaning products[9]
2. Hard water contains magnesium and ____ salts.[7]
4. Negative end of a soap molecule that attracts a water molecule.[11]
6. Chemical that causes algal blooms in waterways.[9]
8. Chemical used in soap making is sodium ____.[9]
9. Chemical name for caustic soda is sodium ____.[9]
13. ____ salts react with soap to form a grey scum.[7]
14. Detergents are made from animal fat or vegetable ____.[3]
16. Type of water that is unsuitable for washing.[4]