

**Project: History and Future of Coastal Upwelling Modes and Biological Responses in the California Current**

**Biological Principal Components**

Year	Scores		Exp_Var	Loadings	
	PCbio1	PCbio2		PCbio1	PCbio2
1982	0.297	1.560	<b>56%</b>	<b>16%</b>	
1983	-5.631	-0.090	<b>MuLD</b>	0.3884	0.0393
1984	0.217	0.445	<b>AuLD</b>	0.3895	0.2094
1985	2.106	0.433	<b>MuRS</b>	0.3959	0.0293
1986	-0.942	0.861	<b>AuRS</b>	0.286	-0.3821
1987	1.767	-0.657	<b>BCRS</b>	0.3375	0.0718
1988	1.971	0.004	<b>PCRS</b>	0.3272	-0.4103
1989	0.838	2.024	<b>SRGC</b>	0.3076	0.4567
1990	-0.616	1.339	<b>SrRe</b>	0.0896	0.6108
1991	1.379	-0.550	<b>PGRS</b>	0.3677	-0.2293
1992	-4.514	0.293			
1993	-1.177	-0.033			
1994	1.230	-0.356			
1995	0.283	-0.110			
1996	-0.602	0.045			
1997	0.478	-0.395			
1998	-4.135	-2.493			
1999	2.178	0.538			
2000	1.629	0.092			
2001	1.998	-1.986			
2002	3.102	-0.018			
2003	0.163	-2.725			
2004	1.880	-0.719			
2005	-2.440	0.324			
2006	-1.461	2.176			

Exp\_Var: Explained variance for each principal component

PCbio1: First principal component including: MULD, AuLD, MuRS, AuRS, BCRS, PCRS, SRGC, SrRe, PGRS

PCbio2: Second principal component including: MULD, AuLD, MuRS, AuRS, BCRS, PCRS, SRGC, SrRe, PGRS