Southern California Coastal Ocean Observing System (SCCOOS)
HF Radar Operations

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High Frequency Radar

- Remote Sensing technique to measure ocean surface currents.
- 5-25MHz radio waves transmitted from station, Bragg scatter off of ocean waves $\frac{1}{2}$ radar wavelength.
- Surface current creates Doppler shift of small wavelength waves, which is measured in the backscatter spectrum.
- Range – 40-200 km
- Resolution 1-5 km
HF Radar Equipment
Network Usage

- Each radar site produces ~ 100 GB/year
- Only processed data is sent to SIO servers
- Radial currents transmitted hourly ~ 5 MB/hr (25 GB/yr)
- Occasional maintenance with Timbuktu/VNC
- Low bandwidth operation
Surface Current Mapping

Surface Current Mapping (25hr avg) - 2006-10-31 00:00 UTC

Cached: 2006-10-31 21:03 UTC

www.sccoos.org
TJ River Plume Tracking
TJ River Plume Tracking
National Network
Realtime Data page

San Diego, Point Loma (SDPL)
Network: SD
Latitude: 32.6658
Longitude: -117.2396
Arrival Time: 2006-08-17 17:11:03
Center Frequency: 25.27 MHz
Beam Pattern: Measured

Most Recent File:
Rad_m_SDPL_06-08-17_1600.hhrrs101uv
File Format: hhrrs101uv

More Views:

Age: 2:16 (H:MM)
Page Generated: 2006-08-17 18:16:44 GMT

UTC Time: 2006-08-17 18:17:00
Local Time: 2006-08-17 18:17:00

SDPL - Database Latency (hours)

SDPL - Range (km)

SDPL - Number of Solutions

SDPL - Latency (hrs) Stats

SDPL - Range (km) Stats

SDPL - Num. Solns. Stats

Time Range: 2006-08-10 - 2006-08-17 UTC
# Hours # Records # Missing % Available
187 185 2 98.5%

Parameter Min Max Median Avg StdDev
Latency 1.18 4.33 1.19 1.29 0.42
Range 35.70 41.70 41.70 40.86 1.18
# Solns. 537.00 799.00 663.00 658.88 47.31