Oregon Coast - Colombia River

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Figure 1. Radarsat-1 image of the Colombia River and Oregon coast showing internal waves. The river plume induces seaward propagating internal waves. The shoreward propagating waves were generated at the coastal shelf break.

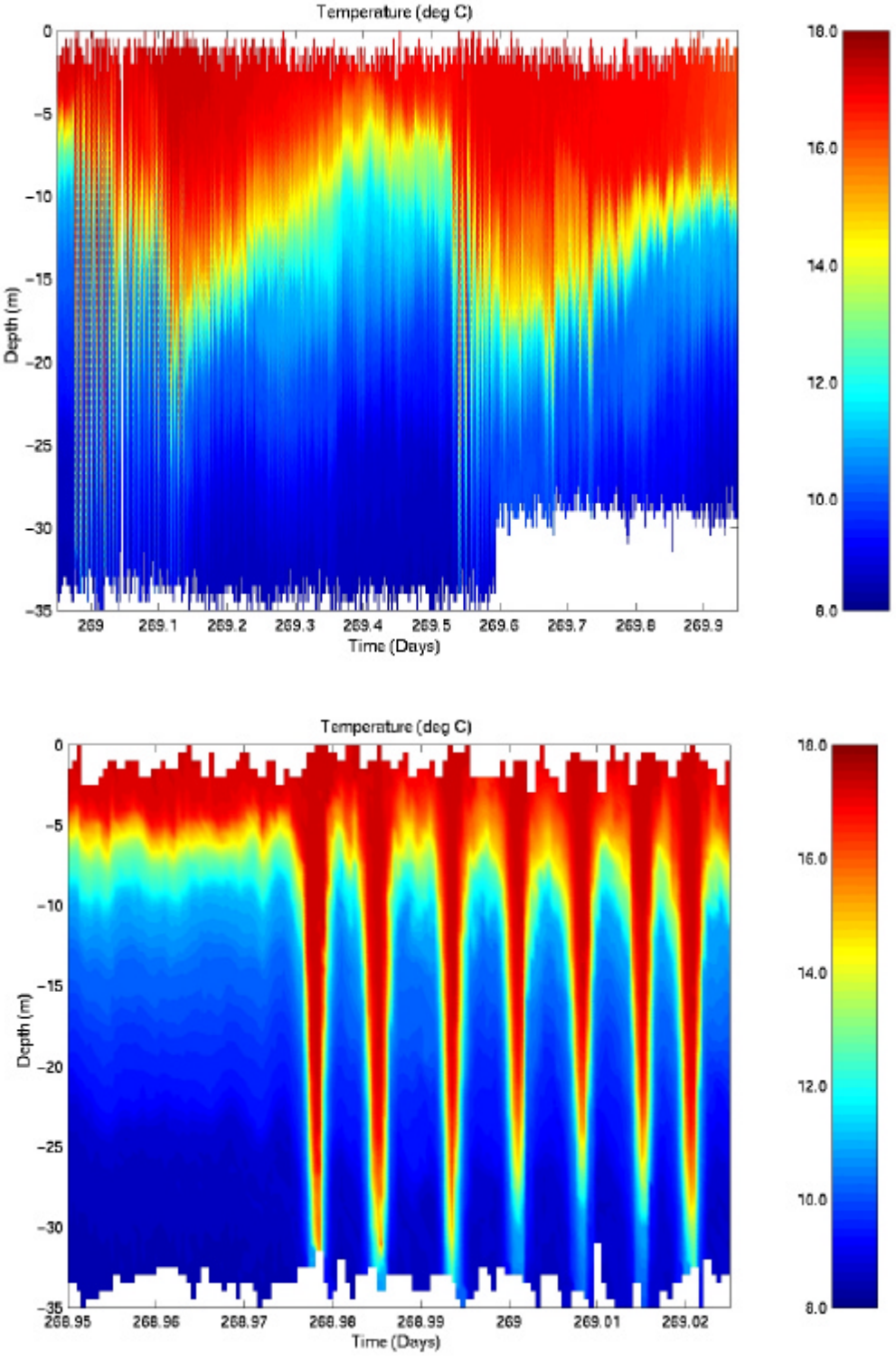

Figure 2. (Upper) A color contour time series of temperature profiles from the surface to 35m depth measured by the LMP over a one-day period. The 10°C span color contour scale is shown the right of the time series panel. The low frequency, semidiurnal internal tide displacement can clearly be seen along the yellow isotherm. (Lower) A profile time series of the first 1.7 hours of the time series shown in Figure 1a. White areas indicate times with no data. [From Stanton and Ostrovsky, 1998]

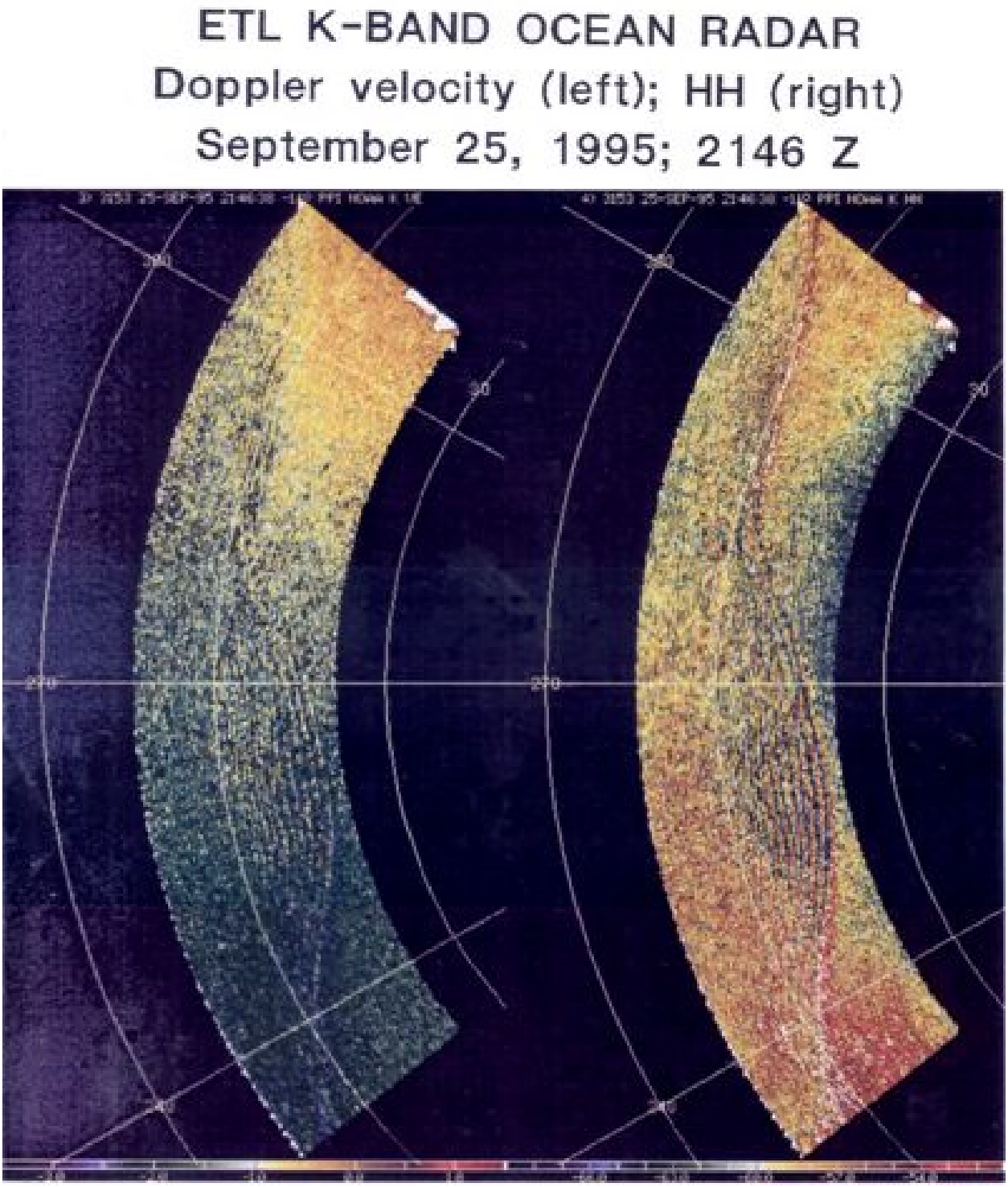

Figure 3. Doppler velocity (left) and normalized radar cross section (right) for the lead wavefront in Figure 2. Data were collected on September 25, 1995 during the COPE experiment using the NOAA ETL scanning Ka band Doppler radar operating at VV polarization. Range marks are at 10-km intervals, Doppler is positive seaward. [From Kropfli et al, 1999]

References

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