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URBAN OIL FIELD DEVELOPMENT IN THE LOS ANGELES BASIN --AN HISTORICAL AND CURRENT PERSPECTIVE ON THE EAST BEVERLY HILLS AND SAN VICENTE FIELDS

The present day Los Angeles basin is an alleviated lowland plain extending about 50 miles northwest/southeast and 20 miles northeast/ southwest. The surface is broken by topographic highs that are expressions of major tectonic trends that provide trapping mechanisms for many of the basin's oil and gas accumulations. The basin has proved to be one of the richest hydrocarbon producing areas in the world based on size and limited volume of sedimentary rock.

Oil production began in the late 1800s with the discovery of the Brea-Olinda and Los Angeles City fields. To date the basin's fields have produced 8.4 billion barrels of oil (BO) and 7.4 trillion cubic feet of gas (CFG). Current oil production is 87,000 BOD and 38 million CFGD from 3800 wells. The basin's oil production represents 11% of California's daily produced oil.

The East Beverly Hills (EBH) and San Vicente (SV) fields were discovered in the mid - 1960's by Chevron USA (now ChevronTexaco) as a result of an extensive corehole drilling program based primarily on subsurface data from previously drilled wells in the north and western portions of the basin. The EBH field has produced 112 million BO and 175 BCF gas and the SV field has produced over 21 million BO and 24 billion CFG. The production in 1993 from the EBH field averaged 2100 BOD and 2700 MCFGD from 62 wells and the SV field produced 1300 BOD and 1400 MCFGD from 25 wells. In September 2002 the EBH field produced 2700 BOD and 6000 MCFGD from 62 wells and the SV field produced 2000 BOD and 3200 MCFD from 34 wells. This meaningful increase in production over the past nine years is the result of new interdisciplinary studies and strategies involving geology and reservoir and production engineering.