

AN INNOVATIVE APPROACH TO EXPLORATION AND EXPLOITATION
DRILLING - THE SLIM HOLE HIGHSPEED DRILLING SYSTEM*

Scott H. Walker

Keith K. Millheim

Amoco Production Company
Research Center, Tulsa, OK

ABSTRACT

Slim hole continuous core drilling and on-site near real time core analysis offers a new dimension for oil and gas exploration, especially in remote, difficult, and environmentally sensitive areas.

Technologies borrowed from the mining and oilfield drilling industries, coupled with newly developed technologies give genesis to a new drilling and evaluation system designed around continuous coring, slim holes, and inverse logging - the logging of the actual rock as it is retrieved.

It is possible this new system could cause a paradigm shift in the practice of exploration.