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**The Importance of Contact, Conductivity, and Connectivity in
Multifractured Horizontal Wells**

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Abstract

Over the past few years, significant advancements have been made in completion and stimulation designs in horizontal wells in unconventional plays, with the primary driver being the improvement of fracture contact area in these very low permeability reservoirs, to improve production volumes and recoveries. Fracture contact area with plug-and-perf or sliding sleeve systems have been intensified by increasing the density of contact points in the formation as well as proppant amount with great success. While these parameters have been optimized, other important parameters such as fracture conductivity and connectivity have been largely neglected. In the journey to improving contact area, proppant conductivity is often sacrificed to save costs, and fracture stimulation treatments are overflushed in order to maximize operational efficiencies on multi-well pads. This presentation will highlight the importance of all of these parameters, and provides steps that can be taken to further optimize and enhance well productivity and economics in the shale plays.

Biography

Wadhah is a Technical Manager at StrataGen, where he advises clients on completions and stimulation optimization in unconventional plays such as the Eagle Ford Shale, using fracture and reservoir modeling, analysis of large datasets, and field supervision of hydraulic fracture treatments. Before joining StrataGen in 2010, he spent five years in field and region engineering roles at BJ Services Company in East Texas, where he was involved in stimulation and cementing services in formations such as the Cotton Valley Sands, James Lime, and Haynesville Shale. He has authored three SPE paper on the topics of stimulation evaluation and optimization in the Eagle Ford Shale, and holds B.S. and M.S. degrees in Petroleum Engineering from New Mexico Tech.