



Sixteen Foot Diameter Large Angle Diffuser (LAD)

A major international chemical company recently contacted Cheng Fluid Systems and asked us to design a Cheng Rotation Vane (CRV) and a Large Angle Diffuser (LAD) for their application. They needed the CRV and LAD to produce a non turbulent flow of fluid across the entire reacting bed of a new reacting vessel that they were designing. Cheng Fluid Systems completed their designs and the chemical company conducted a computer flow analysis to prove the effectiveness of the CRVs and

LADs design. The computer flow analysis proved unequivocally that the CRV and LAD would give them the flow characteristics that they wanted. They then purchased two CRVs and two LADs for two new reacting vessels that they were building. The reacting vessels are very large in diameter and the largest cone of the LAD is over 16 feet in diameter. The picture above shows just part of the sixteen foot diameter LAD that was installed in the top of their reacting vessel.

There is no limit in size of how large or small a CRV and LAD can be. Cheng Fluid Systems Cheng Rotation Vane (CRV) and Large Angle Diffuser (LAD) can be built in any size and for any application. We have sold CRVs and LADs in gas, liquid, steam, and slurry applications. The application can have high velocities or low velocities; high temperatures or low temperatures; high viscosities or low viscosities; and the CRVs and LADs can be made from any materials.

We can help you solve your flow turbulence problems, contact Cheng Fluid Systems with your application.