

# CORNING

## Corning Believes in Long-term Academic Collaborations

What would our world be like without TVs, cell phones or computers? Few of us can imagine a world without glass and all of the technological advancements it has enabled. Glass has long been the measure of our quality of life, from our earliest ability to store perishables, to enabling Thomas Edison to light the world with his tungsten filaments, to the fiberoptic cables that criss-cross the globe to power the telecommunications revolution; these last two technologies were pioneered by Corning. Due to its seamless service to mankind, few recognize the innovation feats in chemistry and materials science that have turned the basic materials of sand to glass and glass to the varying shapes and functions that we have required over the centuries.



Corning Incorporated is the world leader in specialty glass and ceramics. Drawing on more than 150 years of materials science and process engineering, they have been a key player in many of the breakthroughs in glass that power our modern quality of life. Their ability to remain on the leading edge has been fueled by their centralized approach to science and technology. Close to 2000 engineers and scientists are located at Sullivan Park, Corning's, Research Center in Corning, NY, where many of these innovations have occurred. Corning has a unique commitment to large and consistent investments in R&D, patient investment in long-term projects, and a strong belief in exploratory research, all with visible leadership commitments to innovation through good times and bad.

Though Corning's advances are home grown, their innovations have also been fueled by their collaborations with academics. UC Santa Barbara's College of Engineering (CoE) has materials as its very foundation and is recognized as one of the top universities in the country.

Together, Corning and UC Santa Barbara have a spectrum of ongoing, long-term collaborations, from advanced materials questions in solid state lighting, to technologies in telecommunications using VCSELs, to self-assembly techniques to take advantage of unique surface properties induced by nano-structures. Waguish Ishak has been the Division Vice President of Science & Technology and the Director of Corning's West Technology Center in Palo Alto for the last three years. He has had key ties with UC Santa Barbara over his 30-plus years as a technology leader, including positions as Vice President and Chief Technology Officer of Avago Technologies, Vice President and Director of Photonics and Electronics Research Laboratory of Agilent Technologies, and Laboratory Director of Communications and Optics Research Laboratory at Hewlett Packard Labs).

"Universities are an incredible source of new knowledge and new ways of looking at things," says Ishak. "Corporations can significantly benefit from university interactions, but only if they have real interest in incorporating findings from the research into their own initiatives and long-term commitment to the collaborations. Corning's approach to academic collaborations has enabled them to be successful." Larry Coldren, the Dean for the CoE at UC Santa Barbara states, "Corning is an important partner of the CoE both through their broad support of research, including solid-state lighting, catalysts, and vertical-cavity lasers, as well as with one-on-one collaborations with their people. Waguish Ishak in particular has been and continues to be an important interface who has inspired many of these interactions."

"By having an unwavering commitment to innovation and investments in R&D, Corning plans to remain a cutting edge company for another 150 years."