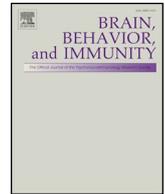




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Viewpoint

Ronald Glaser PNI Pioneer 1939–2019

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Ron was born February 29, 1939 in New York City. Raised in Connecticut he eventually received his PhD from the University of Connecticut in Virology. He then left Connecticut and received his post-doctoral training in Virology at the Baylor College of Medicine.

He started his career in Dr. Fred Rapp's Microbiology and Virology Department at Penn State University's Hershey Medical Center. He became a full professor in 8 years. In 1978 he moved to The Ohio State University where he became the youngest chair in the nation in his field of Virology and Immunology.

He was a cancer virologist working with the Epstein Barr Virus (EBV). He was the first to demonstrate that EBV could infect epithelial cells adding to the understanding of how EBV genome positive nasopharyngeal tumor cells acquired the virus (Glaser et al., 1989).

He then expanded his interest in virology to include stress and the endocrine-immune interface as they relate to various disease states such as cancer, chronic fatigue, and atherosclerosis. His publications in these areas are too numerous to cite but those selected give some appreciation of their scientific breadth (Dittmer et al., 2008; Glaser et al., 2005; Yang et al., 2008; Lemeshow et al., 2011; James Waldman et al., 2008).

Shortly after arriving at Ohio State, Ron attended a university newcomer's picnic where he met a bright young assistant professor in the Dept. of Psychiatry by the name of Jan Kiecolt. They soon

discovered they both had a passion for research and each other! They were married 18 months later.

Jan was interested in whether commonplace daily stressors and the quality of personal relationships could influence the immune system. As Ron has stated publically many times it was hard for him to believe that these psychosocial variables could have important physiologic consequences. He concluded however; why not look at some viral and immune markers during human stress.

From these early discussions they designed experiments that led to a flurry of publications. The first being published in 1984 describing examination stress in medical students producing a decrease in NK activity (Kiecolt-Glaser et al., 1984).

Next was a paper demonstrating that a psychosocial component such as loneliness could affect the immune response (Glaser et al., 1985).

These papers have been highly cited, one has over 1000 citations (Kiecolt-Glaser et al., 1984), reflecting their strong influence on early human psychoneuroimmunology research.

One of the early issues in psychoneuroimmunology was the question of the health-relevance of various relatively small immune alterations following stress. Ron and colleagues used response to vaccines in medical students during exam weeks as a way to test that hypothesis. They found that exam stress delayed their response to a primary inoculation with Hepatitis B vaccine (Glaser et al., 1992).

Furthermore, in older adults who were spousal caregivers they noted marked attenuation by greater than 50% in humoral and cellular immunity to influenza vaccine (Kiecolt-Glaser et al., 1996).

In 2000 they published a paper showing that Alzheimer caregivers had an impaired immune response to a primary inoculation with pneumococcal vaccine (Glaser et al., 2000) and that even mild depressive symptoms could amplify and prolong cytokine responses following influenza vaccination (Glaser et al., 2003).

Jan and Ron pioneered the use of novel *in vivo* paradigms that demonstrated how the marital relationship impacts immune function. In a series of well-controlled laboratory studies they were the first to provide important mechanistic data demonstrating how marital behavior alters endocrine and immune function in young and older adults (Kiecolt-Glaser et al., 1993; Kiecolt-Glaser et al., 1997).

They next looked at stress influences on wound healing.

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Their 1995 Lancet paper provided the first well-controlled demonstration of slower wound healing associated with psychological stress (Kiecolt-Glaser et al., 1995). A later paper described stress related changes in cytokine production at the wound site (Glaser et al., 1999).

Ron cared deeply about the next generation of researchers and he helped shape the careers of numerous students and pre and post docs.

He was committed to the concept that significant scientific advances required input from multiple disciplines, preferably from individuals working in the same environment. This preference for team science led to his being PI on three program project grants and a center grant which lead to the significant multidisciplinary scientific output, some of which I have briefly reviewed.

In 2002 he was recognized by Thomson (formerly ISI) as one of the “World’s Most Cited Authors.”

Ron was an Ohio State University research dean, a Distinguished University Scholar and in 2003 President of the PNI Research Society.

Earl Holland, retired vice president for research communications at OSU had this to say about Ron, “writer’s know most scientists are excited about their work but Ron’s excitement was somewhat different, almost like a kid unwrapping an unexpected present. Every few months he’d call about the latest study and suddenly suggest implications the findings might have with such exuberance that I’d be swept along with him.

Aside from hundreds of publications he authored, or the tens of millions of dollars in research funding he earned, it was his ability to lead and inspire others that set him apart.”

Ron loved his classic cars! He loved to sing—particularly Christmas carols, and he loved to travel. I remember how excited he was to organize an International meeting at beautiful Lake Louise in Alberta, Canada. He and Jan had frequently vacationed there, and it was one his favorite spots in the world.

Sushi, my did Ron love Sushi!

I, however, did not like Sushi.

After refusing for a year to go with him to Akai Hana, I finally relented. As we walked into the restaurant there were a lot of greetings being offered. He seemed to know everyone who worked there. Many of us miss those monthly meetings with Ron sharing good food, science and life struggles and victories.

In addition, I now love Sushi!

On the occasion of Ron’s retirement I commented on one of his signature achievements, the formation of The Ohio State University Institute of Behavioral Medicine Research in 1996.

How did the architect Ron Glaser do it? First, you marry a world class scientist. Next, get a couple of lieutenants to eat Sushi and help build the team. Then organize a small group of local stars to enlarge the team and apply for program project grants.

Finally, watch while creativity begins to seep through the hallways, great papers get published, new careers are ignited and older stars shine more brightly.

What best describes the architect Ron Glaser?

I would suggest the following: creative, visionary, builder, motivator, untiring, pursuer of excellence, encourager, colleague, father, husband, and dear friend.

Thank you Ron for allowing us to be part of your legacy.

While putting these remarks together I had a vision of Ron talking to

St Peter and his angels in heaven. Soon after his arrival Ron had chosen a select team of these winged creatures.

He was waving his arms and was getting them excited about how they could improve their admission criteria for getting people more appropriately placed in Heaven.

He had taken his team building skills to the next level.

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