

Eugene A. Harlan (1921 – 2014): A personal remembrance
by Remington P.S. Stone



*Rem Stone, retired
Research Astronomer
(Image Credit: L. Hatch)*

With the recent death of Gene Harlan, Lick Observatory has lost a wonderful and very unique member of its community. I did not keep notes over the years, so I'll just tell about his time leading up to and with the Observatory as I remember it. No fact checking was done (well, hardly any; I did use the Astronomical Data System to track down his publication record) because that's mostly beside the point. I want to relate the character of the man and his own "story" as I recall him revealing himself to me.

Surely nearly everyone has driven Highway 1 along the spectacular Big Sur coast south of Monterey (if not, stop reading *now* and go do it!), and many will recall the tiny picturesque cluster of motel buildings at Lucia, clinging to the precipitous cliff-side. The Harlan Ranch where Gene grew up nearly a century ago was just adjacent to that spot. The location and deep rural environment surely accounts for much of his strong sense of self-identity and individualism. He finished high school in Monterey, acquired machinist's skills and worked at that trade.

As a young man living and working in Sacramento, he was required to spend a considerable time in bed, recovering from some illness. By chance or design, he used the time not just to read, but to closely study Robert H. Baker's classic *Astronomy*. Later he was working in the south SF Bay area (Redwood City, perhaps?) and liked to drive up to Lick Observatory when he had some spare time. One day he was sitting on the parapet outside the Main Building, enjoying the spectacular view of south San Francisco Bay and the fertile cornucopia that was then Santa Clara Valley, when a gentleman came out and engaged him in conversation. By the end of that talk, an impressed and obviously perceptive Lick Observatory Director Albert Whitford invited Gene to apply for a position as machinist with the Observatory.

Gene and his wife Millie soon moved to the new job atop Mt. Hamilton, where one of Gene's early tasks was to build the set of Polaris seeing telescopes subsequently used by Merle Walker at many places around the globe to assess suitability of possible sites for new observatories. This led to Gene's first publication in 1965 (Harlan and Walker, PASP 1965).

In 1966, nearly 80 years after founding of the Observatory, the scientific staff moved away from Mt. Hamilton to the brand new UC campus at Santa Cruz, leaving behind a decimated community of about 55 people to maintain the telescopes and buildings, including dining and sleeping facilities for visiting astronomers. Gene and Millie were among those who remained. LO astronomers soon tired of the considerable overhead in traveling to the observatory from campus, and realized some routine observing programs could be carried out by a dedicated, responsible and thoughtful proxy. Gene was the obvious candidate.

Gene was a quick study, and brought a serious desire for perfection to every detail of his work. He was totally dependable, and quickly earned the respect of UC astronomers. With tutelage from such luminaries as Vasilevskis, Wirtanen, Klemola and Kinman, Gene soon attained expert status in all things photographic, and became highly proficient with the Astrograph, Crossley and 12- and 36-inch Refractors.

He was very active in the parallax program on the 36-inch Refractor, and the proper motion program on the Astrograph. His list of publications grew quickly and included studies of a large variety of objects, including comets, galaxies, nebulae, quasars, unusual stars and supernova remnants. With the confident endorsement of George Herbig, Gene became resident expert on the Shane 3m coude spectrograph and later the Coude Auxiliary Telescope, teaching many generations of graduate students to successfully use both. He was often the public face of the observatory as operator of the Great Lick Refractor for public events, and as tour guide for visiting college classes.

In May 1976, Gene was pleased and excited to discover Comet Harlan (1976g). He developed a particular interest in stellar classification, and in a series of papers starting in 1969 he independently determined spectral types on the Morgan-Keenan system for over 1000 predominantly F and G stars; papers I and III in this series have each been cited by subsequent researchers more than 50 times. Gene's publication list includes 68 items, of which he was lead author on seven and sole author on three.

Gene fulfilled a special role during the early years of remote operation of the observatory after the move to Santa Cruz. We always had competent on-site Superintendents, but the Observatory Directors in Santa Cruz placed a special trust and reliance on Gene as an unofficial back-channel reporter on mountaintop matters. His direct honesty and obvious devotion to the scientific welfare of the observatory merited this special role. By us mountain folk, he was viewed as the elder statesman and ultimate authority for how things were intended to work.

But above all, Gene was a highly memorable individual. Charming, goodhearted and irrevocably cantankerous, he was the classic curmudgeon. His rustic, homespun, folksy manner was like a window into past times. His jeans with the 3-inch upturned cuffs was not an affectation, it was simply the standard mode when he was growing up in rural California and he saw no good reason to change.

He was the master raconteur of the telescope control room. To this day, a couple of his tales of highly creative mischief as a young man remain my personal favorites to retell at dinner parties (with full credit to Gene, of course).

Although not apparently sensitive about what others thought of him, he was very sensitive about whether or not others would be responsible toward the observatory's unique and irreplaceable equipment, and would be serious and professional observers. He imparted his very high level of professionalism to many graduate students in his time, to their great benefit.

Eventually, Gene and Millie came to occupy a house just below the highway through the observatory grounds. A mother deer was struck and killed by a passing car, leaving a very small baby doe unlikely to survive on its own. With great patience, Gene hand-tamed that tiny creature so he could bottle-feed it for many months. Eventually it came to be a mommy-deer itself, and brought its own fawns in to meet and be hand-fed by Gene. I believe this special familial relationship persisted through at least three generations.

For additional details of his life and family, his published obituary is here:

<http://www.legacy.com/obituaries/montereyherald/obituary.aspx?page=lifestory&pid=170469592>