US astronomy

Kitt Peak and other observatories shaken up

Washington

KITT Peak National Observatory is about to complete its uneasy transition to a new management regime intended to acccelerate work on the next-generation large optical telescope, reemphasize an in-house research programme and save money into the bargain. The changes have also resulted in the easing out of the director of Kitt Peak, Geoffrey Burbidge, who just a year and a half ago had been given a five-year renewal of his contract. The decision to replace Burbidge has raised more than a few evebrows among users of the observatory, who had generally been pleased with his efforts to serve the needs of visiting researchers.

The chief structural change in the management has been unification of the three observatories run by the Association of Universities for Research in Astronomy, Inc. (AURA), under a single "superdirector". The three — Kitt Peak, Cerro Tololo Inter-American Observatory and the National Solar Observatories (Sacramento Peak and McMath Observatories) — are to have a single unified scientific staff as well, a change that will rejuvenate the observatories' languishing in-house research programme and facilitate the transfer of staff among the observatories.

John Jefferies, formerly director of the Institute for Astronomy at the University of Hawaii, is the new superdirector, with the formal title of director of the National Optical Astronomy Observatories (NOAO). Jefferies, whose strong management is credited with building up the Hawaii institute to a major research facility, has moved quickly since his appointment to reshape NOAO along his lines. Last January, AURA announced that since the roles of the three observatory directors would change "substantially" under Jefferies' planned reorganization, they would be considered "new positions", so that existing contracts were void. Both Burbidge and Jack Zirker, director of the solar observatories, had had their appointments renewed for five-year terms in 1982; both found their jobs advertised earlier this year. Neither was selected. In Burbidge's place, Sydney Wolff, Jefferies' former assistant at Hawaii, was appointed. Zirker was replaced by Robert Howard, the Carnegie Institution's former principal solar investigator. Patrick Osmer, the director of Cerro Tololo, was asked to remain in post; the reason given was that he had two years remaining of his term.

Although Burbidge was well liked by visiting astronomers at Kitt Peak, he was, in the word of one astronomer familiar with the situation, "hated" by the on-site staff. Burbidge did an about-face from the policy of the previous director by insisting that in the face of limited funding, the staff's responsibility was to serve the research community first and its own research interests second. AURA is supported by the National Science Foundation (NSF) to the tune of approximately \$25 million a year.

There was also said to be dissatisfaction with the pace of work on the National New Technology Telescope (NNTT), which had been designated a top priority in astronomy by the National Academy's socalled "Field Report". This telescope would be the next major optical facility and would employ either multiple-mirror or segmented-mirror technology. Jefferies created a new division, on a par with the three observatories, to take over planning for NNTT. The desire to step up planning for NNTT may indeed be the chief reason behind the entire shake-up at Kitt Peak. Jefferies has built a reputation on his ability to get big projects off the ground. And indeed, the management rationale for the creation of the superdirectorship laid out in Jefferies' own plan, dated December 1983, wears a bit thin. Apart from making NOAO into "an effective and efficient organization", the superdirector is to engender "a sense of unity and purpose ... through his personal presence, example and influence".

NSF is pleased with the changes, according to Laura P. Bautz, director of NSF's astronomical sciences division; NSF hopes the pooling of the administrative functions of the three observatories under the superdirector may lead to greater efficiency.

One other thing that the superdirectorship will do is take the heat off of AURA's board of directors with respect to dividing up the money from NSF among the various observatories. Dr John Teame, president of AURA, had had that responsibility; Teame said it had been felt that it would be much better to have those decisions made by somebody in a position of clear scientific leadership. **Stephen Budiansky**

Mt Wilson telescope for axe

Washington

AFTER months of rumours, the Carnegie Institution of Washington has announced that it plans to cease operating the 100-inch reflector telescope on Mt Wilson on 1 July next year. The decision is part of an overall plan by the institution to shift observational work to its Las Campanas observatory in Chile; it also reflects the diminishing importance of Mt Wilson as the lights of nearby Los Angeles get ever brighter. The institution operates 40-inch and 100-inch reflectors at Las Campanas.

Carnegie also plans a "phased reduction" in support for two solar telescopes on Mt Wilson. The 60-inch reflector, which is being used in a systematic study of Sun-like stars that has yielded valuable data on solar radiation periods, will continue in operation. That project is supported largely by National Science Foundation (NSF) grants, which are expected to continue for several years.

Dr George Preston, director of the observatories, noted the need to upgrade computer facilities and detectors at Las Campanas. Carnegie, which relies on a hefty endowment income supplemented by government and foundation grants, spent \$1.5 million to operate Mt Wilson last year and \$900,000 to operate Las Campanas.

Despite some optimistic statements from Carnegie officials about finding an organization to take over the Mt Wilson telescopes, few astronomers seem to think that likely. The 100-inch reflector has been used mainly by on-site staff in recent years; and because of the light pollution the work is limited to observing single relativelybright stars. "Only a very restricted class of programs can be taken seriously at that site" said Rudy Schild of the Harvard-Smithsonian Astrophysical Observatory. The more exciting observational work on extra-galactic objects requires the dark-sky conditions now available only in the Southern Hemisphere.

Lee Hartmann, another astronomer at Harvard-Smithsonian who has used Mt Wilson, says that the only way to "sell" the 100-inch reflector would be another solarstellar programme like that in progress at the 60-inch Mt Wilson telescope. That would be "politically difficult" to justify, he said. It is generally considered to be out of the question that the most obvious supporters of astronomical research NSF and the National Aeronautical and Space Administration - would be interested in taking over the 100-inch telescope. Interest in the solar telescopes is said to run higher. Carnegie officials refuse to discuss the status of negotiations that they say are now taking place with various interested parties. Stephen Budiansky

Correction

IN the 7 June issue of *Nature* (p.500), reference is made in the penultimate paragraph to a "Shell and Gist Brocades . . . joint, DF1,300 million, biotechnology laboratory", which is not correct. Shell is involved in a joint research venture with Gist Brocades. However, all the research is carried out at the (existing) Shell Sittingbourne Research Centre in the United Kingdom and at Gist Brocades' laboratory in Delft, the Netherlands.