

This should help to make the results of the image analyses easier to interpret, a wish expressed by several observers. The night assistants start the system at the beginning of every night.

### Field Test of Major Component of New Control System

In May, another major field test of the new VLT-like control system was performed. With the many motorised functions of the adapter, it was a major test also of the first release of the VLT motor library. Again, no fundamental problem was found. However, further tests have to be performed on side A (IRSPEC/SUSI) to fulfil all objectives.

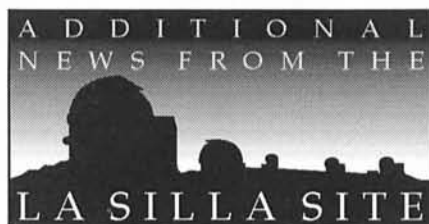
An important logistical result has been that, with the necessary careful preparation, it is feasible that such tests can be performed by on-site staff who have not been directly involved in the writing of the code. A necessary requirement was, of course, the availability of the high-speed link between Garching and La Silla. Due to the time difference between Chile and Germany, the test engineers at La Silla could every morning resume their work with a new version of the software which had been further debugged in Garching on the basis of the previous day's test results.

This is an important and encouraging conclusion for the commissioning and operation of the VLT.

### Digital Sky Survey On Line

Thanks to the help of the Observation Support and Data Handling Group, the Digital Sky Survey prepared by the Space Telescope Science Institute is now available on line to remote observers in Garching. The same service will soon be offered to NTT observers at La Silla, too. It should prove to be very useful for the preparation of observations (astrometry, finding charts) as well as for the comparison with observations of a field at an earlier epoch.

The NTT Team  
e-mail address: ntt@eso.org



## CASPEC Thorium-Argon Atlas in the 3050–3650 Å Region

L. PASQUINI and L. ACHMAD

The CASPEC spectrograph has been in use for more than 10 years at the 3.6-m telescope at La Silla. With the implementation of the Blue Cross-disperser (Pasquini and Gilliotte, 1992) and the advent of new detectors, CASPEC has reached very good capabilities in the blue-UV range, and the demand for its use at these spectral regions has rapidly grown.

Because the existing CASPEC Thorium-Argon Atlas (D'Odorico et al., 1987) extends only to 3600 Å with the 31.6 lines/mm echelle and to 3400 Å with the 52

lines/mm echelle, an extension was required to provide the users with a suitable reference for working in the UV. A new atlas has thus been prepared to fill this gap. The 31.6 lines/mm echelle was used in combination with the Long Camera and the new 1K Tektronix CCD (ESO #37). A new line list is now available, which extends to 3060 Å, and is implemented in the MIDAS package. The present Atlas is intended to serve CASPEC users, and we are confident that it may also be helpful for observers using different instrumentation. Paper

copies are available at the La Silla Observatory (Astronomy Secretary) and at the Headquarters in Garching (Section Visiting Astronomers). The Atlas is also available in the WWW ESO/La Silla home page (Documentation/Others section).

### References

- D'Odorico, S., Ghigo, M., Ponz, D., 1987: 'An Atlas of the Thorium Argon Spectrum for the ESO Echelle Spectrograph in the  $\lambda\lambda$  3400–9000 Å Region', ESO.  
Pasquini, L., Gilliotte, A., 1992: 'CASPEC Improvements' *The Messenger* 71, 54.

## Rotating Half Wave Plate for EFOSC1 Refurbished

H. SCHWARZ and S. GUISSARD

The polarimetric mode of EFOSC1 at the 3.6-m telescope has been made more sophisticated by the addition of a rotatable super-achromatic half wave plate (HWP). In addition to imaging polarimetry, it is now possible to do spectropolarimetry of extended objects by using a MOS mask with a series of 19" long slitlets, spaced 21" apart along a direction perpendicular to the dispersion. For objects larger than 20", two images have to be taken with a telescope shift of 20" in between, for smaller objects, one image suffices since the source falls entirely within one slitlet. Two images per telescope position have to be taken with a 22.5° rotation of the HWP for the second

image. These images yield two orthogonally polarised signals each, thus providing four signals from which the polarimetric and intensity information can be derived. Since only three are needed, there is even some redundancy. Twice the mean of the sum of all four images gives the intensity of the source. No instrument rotation is necessary now.

The acquisition of objects for both imaging and spectropolarimetry has become faster, because there is no longer the need to re-acquire the objects after rotating the instrument. By using two special masks, mounting the Wollaston polarising prism in the filter wheel, and the necessary filters and grisms in the grism

wheel, both imaging and spectropolarimetry can be done with one setup of EFOSC1. Masks have been prepared with coronagraphic spots, allowing coronagraphic polarimetry to be done. By letting the HWP rotate continuously, flat-fielding is made easier too.

Recently, this super-achromatic half wave plate for EFOSC1 was refurbished by Halle, to remove a 40" wedge on the faces of the plate, and to improve the optical quality of the surfaces. This wedge produced image motion of about 100  $\mu$ m on the CCD when rotating the HWP, making data reduction more difficult. The wedge is now less than 2" and the optical quality about  $\lambda/6$  over the surface.