

Contents of Volume 15 (2006)

Number 1

PROCEEDINGS OF THE MEETING
“HOT SUBDWARF STARS AND RELATED OBJECTS”
2005 June 6–10, Santa Cruz de la Palma

<i>R. H. Østensen.</i> The 2nd meeting on hot subdwarf stars and related objects.....	1
<i>C. H. Ree, Y.-W. Lee, Y.-J. Sohn, S. K. Yi, S.-J. Yoon.</i> The look-back time evolution of the UV upturn phenomenon.....	5
<i>D. Brown, S. Yi, Z. Han, S.-J. Yoon.</i> Binary population synthesis, sdB stars and the UV upturn.....	13
<i>Z. Han, P. Podsiadlowski, A. E. Lynas-Gray.</i> UV upturn of elliptical galaxies.....	17
<i>G. Busso, S. Moehler, M. Zoccali, U. Heber, S. K. Yi.</i> Hot subdwarfs in the Galactic bulge.....	25
<i>S.-J. Joo, Y.-W. Lee, S.-J. Yoon, S.-I. Han, C. Chung, C. H. Ree, Y.-C. Kim, Y.-J. Sohn, S. K. Yi.</i> Super-helium-rich populations in globular clusters: the origin of extreme horizontal branch.....	33
<i>S. Moehler, A. V. Sweigart.</i> The nature of the hot stars in the bulge globular cluster NGC 6388.....	41
<i>L. M. Buson, E. Bertone, A. Buzzoni, G. Carraro.</i> New candidate EHB stars in the open cluster NGC 6791: looking locally into the UV-upturn phenomenon.....	49
<i>C. Moni Bidin, R. A. Mendez, S. Moehler, G. Piotto, A. Recio-Blanco, Y. Momany.</i> Spectroscopic search for binaries among EHB stars in globular clusters.....	53
<i>S. J. O’Toole, R. Napiwotzki, U. Heber, H. Drechsel, S. Frandsen, F. Grundahl, H. Bruntt.</i> NGC 6121-V46 – a low-mass double degenerate ellipsoidal variable in a globular cluster.....	61
<i>M. D. Reed, D. Kilkenney, D. M. Terndrup.</i> Do EC 14026 stars exist in clusters?.....	65
<i>C. Winter, C. S. Jeffery, A. Ahmad, D. R. Morgan.</i> Hot subdwarfs from low-dispersion surveys – methods of extraction and automatic analysis.....	69

<i>J. Rhee, M. Seibert, R. H. Østensen, S. K. Yi, S.-C. Rey, R. M. Rich, L. Bianchi, Y.-W. Lee.</i> A spectroscopic search for new sdB stars from the GALEX survey	77
<i>R. A. Wade, M. A. Stark, R. F. Green, P. R. Durrell.</i> Searching for the “missing” PG hot subdwarfs in SDSS and GALEX data ...	81
<i>R. H. Østensen.</i> The subdwarf database: released	85
<i>U. Heber, H. Hirsch, A. Ströer, S. O’Toole, S. Haas, S. Dreizler.</i> Subluminous O stars	91
<i>M. Fontaine, P. Chayer, F. Wesemael, G. Fontaine, R. Lamontagne.</i> Analysis of the FUSE spectra of the He-poor sdO star MCT 0019–2441.....	99
<i>H. Edelmann, U. Heber, R. Napiwotzki.</i> Metal abundances of sdB stars	103
<i>N. Przybilla, M. F. Nieva, H. Edelmann.</i> NLTE analyses of sdB stars: progress and prospects	107
<i>N. T. Behara, C. S. Jeffery.</i> New model atmospheres for hydrogen-deficient stars: continuous and line opacities.	115
<i>C. Pereira, F. Wesemael, P. Bergeron.</i> Atmospheric parameters for subdwarf B stars: a consistency check between the Balmer lines and the far-ultraviolet spectrum	123
<i>N. Przybilla, K. Butler, U. Heber, C. S. Jeffery.</i> Improved helium line formation for extreme helium stars	127
<i>P. Chayer, M. Fontaine, G. Fontaine, F. Wesemael, J. Dupuis.</i> FUSE observations of germanium, zirconium and lead in sdB stars	131
<i>A. Ahmad, C. S. Jeffery.</i> Chemical abundances of helium-rich subdwarf B stars	139
<i>K. Unglaub.</i> Multicomponent winds in sdB stars?	147
<i>C. Karl, U. Heber, R. Napiwotzki, S. Geier.</i> Spectroscopic analysis of sdB binaries from the SPY project	151
<i>A. Ahmad, C. Winter, C. S. Jeffery.</i> Spectral analysis of sdB-He stars from the SDSS	159
<i>N. Przybilla, M. F. Nieva, U. Heber, C. S. Jeffery.</i> Non-LTE metal abundances in V652 Her and HD 144941	163

Number 2

PROCEEDINGS OF THE MEETING “HOT SUBDWARF STARS AND RELATED OBJECTS” 2005 June 6–10, Santa Cruz de la Palma

(Continued from *Baltic Astronomy*, Vol. 15, No. 1, 2006)

<i>E. M. Green, G. Fontaine, E. A. Hyde, S. Charpinet, P. Chayer.</i> Subdwarf B star evolutionary systematics, conundrums and cautionary remarks.....	167
<i>M. A. Stark, R. A. Wade.</i> The nature of the late-type companions in hot subdwarf composite- spectrum binaries.....	175
<i>B.-Q. For, E. M. Green.</i> Monte Carlo simulations of post-common envelope sdB star plus white dwarf binaries.....	183
<i>L. Morales-Rueda, P. F. L. Maxted, T. R. Marsh, D. Kilkenny, D. O'Donoghue.</i> Subdwarf B binaries in the Edinburgh-Cape survey.....	187
<i>H. Edelmann, M. Altmann, U. Heber.</i> Discovery of four radial velocity variable sdB stars with eccentric orbits.....	191
<i>E. Sipahi, S. Evren, G. Taş, C. İbanoğlu.</i> Photometric period variation of V1379 Aql.....	199
<i>A. N. Mortimore, A. E. Lynas-Gray.</i> Helium, carbon and silicon abundances in the HW Vir eclipsing binary subdwarf-B primary.....	207
<i>G. Fontaine, E. M. Green, P. Chayer, P. Brassard, S. Charpinet, S. K. Randall.</i> On the empirical instability domains for pulsating subdwarf B stars.....	211
<i>C. Schoenaers, A. E. Lynas-Gray.</i> Line-profile variations in pulsating sdB stars as a pulsation mode diagnostic.....	219
<i>A. Baran, R. Oreiro, A. Pigulski, F. Pérez Hernández, A. Ulla.</i> Balloon 090100001: a link between the two classes of pulsating hot subdwarfs.....	227
<i>J.-E. Solheim, R. H. Østensen.</i> More new sdB pulsators discovered with the Nordic Optical Telescope.....	231
<i>J. H. Telting, R. H. Østensen, U. Heber, T. Augusteijn.</i> Time-resolved spectroscopy of the bright sdBV star Balloon 090100001.....	235
<i>S. Geier, U. Heber, N. Przybilla, R.-P. Kudritzki.</i> Time-resolved spectroscopy of KPD 1930+2752.....	243

<i>S. L. Harms, M. D. Reed, S. J. O’Toole.</i> Time-series spectroscopy and photometry of PG 1219+534.....	251
<i>D. Kilkenny, J. P. Kotze, E. Jurua, M. Brownstone, H. A. Babiker.</i> Four rapidly pulsating sdB stars revisited	255
<i>C. S. Jeffery, C. Aerts, V. S. Dhillon, T. R. Marsh.</i> ULTRACAM photometry of pulsating subdwarf B stars.....	259
<i>M. D. Reed.</i> Searching for observational evidence of tidally inclined pulsations.....	269
<i>C. Aerts, C. S. Jeffery, V. S. Dhillon, T. R. Marsh, P. Groot.</i> High-speed ULTRACAM colorimetry of the subdwarf B star SDSS J171722.08+58055.8.....	275
<i>G. W. Wolf, M. D. Reed, A.-Y. Zhou et al.</i> Follow-up observations of known EC 14026-type pulsators	279
<i>S. Kawaler, M. Vučković.</i> PG 0014+067: WET observations and a new twist to the sdB star puzzle....	283
<i>S. K. Randall, G. Fontaine, E. M. Green, P. Brassard, D. M. Terndrup.</i> Long-period variable subdwarf B stars: prospects for asteroseismology	291
<i>J.-P. Blanchette, P. Chayer, F. Wesemael, G. Fontaine, M. Fontaine, J. Dupuis, J. W. Kruk, E. M. Green.</i> FUSE determination of the abundances of iron-peak elements in the PG 1716+426 stars	301
<i>S. Charpinet, G. Fontaine, P. Brassard, P. Chayer, E. M. Green.</i> The structure of subdwarf B stars as revealed by asteroseismology	305
<i>C. Rodríguez-López, A. Moya, R. Garrido, J. MacDonald, A. Ulla, S. Dreizler, S. D. Hügelmeyer, M. Manteiga.</i> An approach to a stability analysis of a sdO star	313
<i>D. Kilkenny, D. O’Donoghue, M. D. Reed, N. Hambly, H. McGillivray.</i> A new large-amplitude slowly pulsating sdB star	317
<i>C. S. Jeffery, U. Heber, S. Dreizler, S. J. O’Toole, S. L. Schuh, V. M. Woolf, S. Falter, A. Nitta, S. Kleinman, J. Krzesinski, M. Billeres.</i> The MSST campaign: 4 m spectroscopy of PG 1605+072.....	321

Number 3

<i>V. Laugalys, V. Straižys, F. J. Vrba, R. P. Boyle, A. G. D. Philip, A. Kazlauskas.</i> CCD photometry and classification of stars in the North America and Pelican nebulae region. II. The region of NGC 6997	327
<i>S. J. Adelman, W. L. Harrell.</i> BVRI photometry of NZ Gem, HD 73017, HD 77247, RT Vir and 104 Her ...	363

<i>D. J. MacConnell.</i> IRAS-associated carbon stars found on objective-prism plates	383
<i>A. Siviero, S. Dellaporta, U. Munari.</i> Period change, spot migration and orbital solution for the eclipsing binary AR Lac	387
<i>V. G. Klochkova, T. Kipper.</i> Optical spectroscopy of the post-AGB carbon star CGCS 6857 = IRAS 20000+3239	395
<i>A. Hirv, K. Annuk, T. Eenmäe, T. Liimets, J. Pelt, A. Puss, M. Tempel.</i> Orbital elements and mass-loss rate of V 444 Cyg	405
<i>U. Haud, P. M. W. Kalberla.</i> Gaussian decomposition of HI surveys. II. Separation of problematic Gaussians	413
<i>A. Sapar, R. Poolamäe, L. Sapar.</i> High-precision approximation expressions for line profiles of hydrogenic particles	435
<i>V. Straizys, R. Lazauskaitė, A. G. A. Brown, K. Zdanavičius.</i> Star classification possibilities with the Gaia spectrophotometers. I. Simulated spectra	449
<i>D. Narbutis, V. Vansevicius, K. Kodaira, I. Šablevičiūtė, R. Stonkutė, A. Bridžius.</i> A survey of compact star clusters in the South-West field of the M 31 disk. UBVR photometry	461
<i>D. Narbutis, R. Stonkutė, V. Vansevicius.</i> A comparison of the published stellar photometry data in the South-West field of the M 31 galaxy disk	471

Number 4

<i>V. Laugalys, V. Straizys, F. J. Vrba, R. P. Boyle, A. G. D. Philip, A. Kazlauskas.</i> CCD photometry and classification of stars in the North America and Pelican nebulae region. III. The dark cloud L 935	483
<i>A. Kazlauskas, V. Straizys, S. Bartašiūtė, V. Laugalys, K. Černis, R. P. Boyle, A. G. D. Philip.</i> Zero-age main sequence in the HR diagram of the Vilnius photometric system	511
<i>T. Kipper, V. G. Klochkova.</i> The optical spectrum of R CrB at the 2003 light minimum	521
<i>T. Kipper, V. G. Klochkova.</i> A cool R Coronae Borealis star ZUMi	531

<i>A. Bartkevičius, J. Sperauskas.</i> High velocity spectroscopic binary orbits from photoelectric radial velocities: BD +30 2129 A	539
<i>I. Šablevičiūtė, V. Vansevicius, K. Kodaira, D. Narbutis, R. Stonkutė, A. Bridžius.</i> A survey of compact clusters in the South-West field of the M31 disk. Structural parameters	547
<i>N. J. Papadopoulos, N. D. Caranicas.</i> Mass transport in double-barred galaxy models	561
<i>M. M. Ćirković, I. Damjanov, A. Lalović.</i> H ₂ and HD absorption lines and the cosmic ray flux in high-z galaxies	571
<i>D. Semionov, K. Kodaira, R. Stonkutė, V. Vansevicius.</i> Radiative transfer problem in dusty galaxies: photometric effects of dusty spiral arms	581
<i>D. Semionov, V. Vansevicius.</i> Radiative transfer problem in dusty galaxies: a program suite	601