

Publication List

Hsiang-Kuang Chang, March 2008

A. Papers in journals covered by SCI

1. Pulsar Nebulae (1992)
W. Kundt, H.-K. Chang, *Ap&SS* 193, 145
2. Gamma-Ray Bursts from Nearby Neutron Stars (1993)
W. Kundt, H.-K. Chang, *Ap&SS* 200, 151
3. Pulsar Radio Emission (1993)
H.-K. Chang, W. Kundt, *Ap&SS* 209, 313
4. Magnetic Inverse Compton Scattering above Polar Caps (1995)
H.-K. Chang, *A&A* 301, 456
5. The Soft Spectrum of PSR B1509-58 (1996)
H.-K. Chang, K. Chen, C. Ho, *A&AS* 120, C81
6. Optical Pulse Polarization of the Crab Pulsar (1996)
K. Chen, H.-K. Chang, C. Ho, *ApJ* 471, 967
7. RXTE Observation of PSR B1951+32 (1997)
H.-K. Chang, C. Ho, *ApJ* 479, L125
8. Ambient Acoustic Imaging in Helioseismology (1997)
H.-K. Chang, D.-Y. Chou, B. LaBonte, the TON team, **Nature** 389, 825
9. Probing Solar Active Regions with the Phase Information of Acoustic Imaging (1998)
H.-R. Chen, D.-Y. Chou, H.-K. Chang, M.-T. Sun, S.-J. Yeh, B. LaBonte, the TON team, *ApJ* 501, L139
10. Rossi X-ray Timing Explorer Observation of PSR B0656+14 (1999)
H.-K. Chang, C. Ho, *ApJ* 510, 404
11. Acoustic Imaging in Helioseismology (1999)
D.-Y. Chou, H.-K. Chang, M.-T. Sun, B. LaBonte, H.-R. Chen, S.-J. Yeh, the TON team, *ApJ* 514, 979
12. Determining Emission Location and Mechanisms of High Energy Emission from Pulsars -- the Role of INTEGRAL (1999)
H.-K. Chang, T. Guo, M.-C. Liang, C. Ho, *Astrophysical Letters and Communications* 38, 53

13. In Search of Emerging Flux underneath the Solar Surface with Acoustic Imaging (1999)
H.-K. Chang, D.-Y. Chou, M.-T. Sun, ApJ 526, L53
14. A Study of Sunspots with Phase Time and Travel Time of P-mode Waves in Acoustic Imaging (2000)
D.-Y. Chou, M.-T. Sun, H.-K. Chang, ApJ 532, 622
15. X-ray Timing Analysis of PSR B1951+32 with ASCA and RXTE Data (2000)
H.-K. Chang, T.-F. Guo, Chinese Journal of Physics 38, 429
16. Determining the Magnetic Inclination of PSR B0656+14 from its Thermal X-ray Emission (2001)
H.-K. Chang, Chinese Journal of Physics 39, 319
17. Electrostatic Corrections to the Equation of State for a Fully Ionized Hydrogen Atmosphere of Magnetic Neutron Stars (2002)
H.-K. Chang, Chinese Journal of Physics 40, 395
18. Thermal Flux Fractions of Anomalous X-ray Pulsars RX J170849-400910 and 4U 0142+61 (2004)
H.-K. Chang, Chinese Journal of Physics 42, 135
19. Periodicity Search in the X-ray Data of RX J0007.0+7302 (2005)
L. C.-C. Lin, H.-K. Chang, Ap&SS 297, 361
20. A Two-dimensional Electrodynamical Outer Gap Model for Gamma Ray Pulsars: Gamma-ray Spectrum (2006)
J. Takata, S. Shibata, K. Hirotani, H.-K. Chang, MNRAS 366, 1310
21. Occultation of X-rays from Scorpius X-1 by Small Trans-Neptunian Objects (2006)
H.-K. Chang, S.-K. King, J.-S. Liang, P.-S. Wu, L. C.-C. Lin, C.-J. Chiu, **Nature** 442, 660
22. Measuring Neutron Star Mass and Radius with Three Mass-Radius Relations (2007)
C.M. Zhang, H. X. Yin, Y. Kojima, H.-K. Chang, R.X. Xu, X.D. Li, B. Zhang, B. Kiziltan, MNRAS 374, 232
23. Polarization of High-Energy Emissions from the Crab Pulsar (2007)
J. Takata, H.-K. Chang, K. S. Cheng, ApJ 656, 1044
24. The Applications of the MHD Alfvén Wave Model for kHz Quasi-periodic Oscillations (2007)
C.M. Zhang, H. X. Yin, Y. H. Zhao, H.-K. Chang, L.M. Song, *Astronomische Nachrichten* 328, 491

25. Millisecond Dips in the RXTE/PCA Light Curve of Sco X-1 and TNO Occultations (2007)
H.-K. Chang, J.-S. Liang, C.-Y. Liu, S.-K. King, MNRAS 378, 1287
26. Spheroidal and Torsional Modes of Quasistatic Shear Oscillations in the Solid Globe Models of Nuclear Physics and Pulsar Astrophysics (2007)
S. Bastrukov, H.-K. Chang, S. Misicu, I. Molodtsova, D. Podgany, International Journal of Modern Physics A 22, 3261
27. The Nuclear Compton Telescope (NCT) project – Scientific Goals and Expected Sensitivity (2007)
H.-K. Chang, S. Boggs, Y.-H. Chang, Advances in Space Research 40, 1281
28. The Phase-resolved High Energy Spectrum of the Crab Pulsar (2007)
J. J. Jia, A. P. S. Tang, J. Takata, H.-K. Chang, K. S. Cheng, Advances in Space Research 40, 1425
29. Torsional shear oscillations in the neutron star crust driven by restoring force of elastic stresses (2007)
S. Bastrukov, H.-K. Chang, J. Takata, G.-T. Chen, I. Molodtsova, MNRAS 382, 849
30. Pulse Profiles, Spectra and Polarization Characteristics of Non-thermal Emissions from the Crab-like Pulsars (2007)
J. Takata, H.-K. Chang, ApJ 670, 677
31. Particle Acceleration and Non-thermal Emission in Pulsar Outer Magnetospheric Gaps (2008)
J. Takata, H.-K. Chang, S. Shibata, MNRAS, in press (accepted December 18, 2007)
32. Eigenfrequency of nodeless elastic vibrations locked in the crust of quaking neutron stars (2008)
S. Bastrukov, H.-K. Chang, G.-T. Chen, I. Molodtsova, Modern Physics Letters A 23, 477
33. Periodicity Search of Possible X-ray Counterparts to Radio-quiet Gamma-ray Pulsar Candidates (2008)
L. C.-C. Lin, H.-K. Chang, MNRAS, in press (accepted March 25, 2008)
34. Millisecond Dip Events in the 2007 RXTE/PCA Data of Sco X-1 and the TNO size distribution (2008)
C.-Y. Liu, H.-K. Chang, J.-S. Liang, S.-K. King, MNRAS, submitted

B. Papers not covered by SCI

1. Nearby Neutron Stars as the Sources of the Gamma-Ray Bursts (1994)
W. Kundt, H.-K. Chang, AIP Conf. Proc. 307, page 596
2. Spectral Studies of Magnetic Photon Splitting in the March 5 Event and SGR 1806-20 (1996)
H.-K. Chang, K. Chen, E. E. Fenimore, C. Ho, Proceedings of the 3rd GRB Workshop, Huntsville, AIP Conf. Proc. 384, page 921
3. Acoustic Imaging and Subsurface Absorption Structure of Sunspots (1997)
H.-K. Chang, D.-Y. Chou, B. LaBonte, the TON team, Proceedings of IAU Symp. 185, page 219
4. Results of Acoustic Imaging with the TON Data (1998)
D.-Y. Chou, H.-K. Chang, H.-R. Chen, B. LaBonte, M.-T. Sun, S.-J. Yeh, the TON team, Proceedings of SOHO 6 / GONG 98 Workshop, Boston, page 597
5. Subsurface Acoustic Images of Solar Active Regions in Different Frequencies with TON Data (1998)
H.-K. Chang, D.-Y. Chou, H.-R. Chen, B. LaBonte, M.-T. Sun, S.-J. Yeh, the TON team, Proceedings of SOHO 6 / GONG 98 Workshop, Boston, page 621
6. Dissipation and Emission of p-mode in the Quiet Sun from Acoustic Imaging with the TON Data (1998)
M.-T. Sun, D.-Y. Chou, H.-K. Chang, H.-R. Chen, S.-J. Yeh, B. LaBonte, the TON team, Proceedings of SOHO 6 / GONG 98 Workshop, Boston, page 657
7. Acoustic Imaging and Subsurface Structure of Solar Active Regions (1998)
H.-K. Chang, D.-Y. Chou, H.-R. Chen, the TON team, Proceedings of ASPE98, Potsdam, ASP Conf. Series 184, page 171
8. ASCA and RXTE Upper Limits to Pulsed Emissions from PSR B1951+32 (2000)
H.-K. Chang, T.-F. Guo, Proceedings of Pulsar Astronomy - 2000 and Beyond, Bonn, ASP Conference Series 202, page 327
9. The BeppoSAX Phase-resolved Spectra of the Anomalous X-ray Pulsar RX J170849-400910 (2002)
H.-K. Chang, Proceedings of the 8th IAU Asian-Pacific Regional Meeting, Tokyo, page 317
10. Computation of Neutron Star Surface Emission Spectra for Arbitrary Magnetic Field Directions without Diffusion Approximation (2006)
L.-W. Yeh, G.-T. Chen, H.-K. Chang, Proceedings of the 363rd Heraeus Seminar on Neutron Stars and Pulsars, Bad Honnef, page 137 (astro-ph/0612676)
11. Particle Acceleration in Pulsar Magnetospheres (2006)
P.-C. Hsu, K. Hirotani, H.-K. Chang, Proceedings of the 363rd Heraeus Seminar on

Neutron Stars and Pulsars, Bad Honnef, page 141 (astro-ph/0612677)

12. Study on Polarization of High-Energy Photons from the Crab Pulsar (2006)

J. Takata, H.-K. Chang, K.S. Cheng, Proceedings of the 363rd Heraeus Seminar on Neutron Stars and Pulsars, Bad Honnef, page 120 (astro-ph/0701255)

13. A three-dimensional model for the high-energy emissions from the Crab pulsar (2007)

J. Takata, H.-K. Chang, K.S. Cheng, THE FIRST GLAST SYMPOSIUM. AIP Conference Proceedings, Volume 921, page 423