LITERATURE: INTERSTELLAR MEDIUM

GENERAL BOOKS

- *The Physics of the Interstellar Medium, 2nd edition*, 1997 J.E. Dyson and D.A. Williams (IOP graduate series in astronomy). Introductory textbook on ISM.
- *Astrophysics of Gaseous Nebulae and Active Galactic Nuclei*, 1989, D.E. Osterbrock (University Science, California). Excellent textbook on ionized H II regions in the ISM; highly recommended.
- *Galactic Interstellar Medium*, 1992, ed. D. Pfenniger & P. Bartholdi (Springer). Chapter by R. Genzel, §I – §IV (sold out, but available in library)
- *Interstellar Processes*, 1987, eds. D.J. Hollenbach and H.A. Thronson (Kluwer, Dordrecht) (available in paperback). Useful collection of chapters by experts on various ISM aspects, but rapidly getting out of date. New book expected in mid-2001.
- *Dust in the Galactic Environment*, 1992, D.C.B. Whittet (IOP, Bristol). Excellent introductory book to interstellar dust.
- *Physical Processes in the Interstellar Medium*, 1978, L. Spitzer (Wiley, New York). Classic textbook, but difficult to read.
- *Interpreting Astronomical spectra*, 1996, D. Emerson (Wiley, New York).

RECENT OTHER BOOKS AND CONFERENCE PROCEEDINGS

- *The Origin of Stars and Planetary Systems,* 1999, eds. C.J. Lada and N.D. Kylafis, NATO ASI (Kluwer, Dordrecht). Brandnew collection of review papers on various aspects of molecular clouds and low– and high–mass star formation
- *Protostars and Planets IV*, 2000, eds. V.G. Mannings, A. Boss and S. Russell (University of Arizona, Tucson). Brandnew collection of review papers by experts on various aspects of star-, planet- and solar-system formation, with a few chapters on molecular clouds.
- *The Physics and Chemistry of the Interstellar Medium,* 1999, Proc. 3'nd Zermatt meeting, eds. V. Ossenkopf et al. (GCA Verlag, Herdecke).
- *Asymptotic Giant Branch Stars*, 1999, IAU Symposium 191, eds. A. Lebre et al. (Kluwer, Dordrecht). Most recent book on late stages of stellar evolution and return of matter to the ISM.

- *The Molecular Astrophysics of Stars and Galaxies*, 1998, eds. T.W. Hartquist and D.A. Williams (Oxford University Press). Most recent collection of review and tutorial chapters on various aspects of molecular astrophysics.

- *The Astrochemical Evolution of the Interstellar Medium*, 1997, E.L.O. Bakes (Twin Press). Introductory book on astrochemistry.

- *Planetary Nebulae*, IAU Symposium 180, 1997 eds. H.J. Habing and H.J.G.L.M. Lamers (Kluwer, Dordrecht). Most recent book on planetary nebulae.

- *From Stardust to Planetesimals*, 1996 eds. Y. Pendleton and A.G.G.M. Tielens (ASP conference series 122). Up to date conference proceedings on the evolution of dust from star-forming regions to their incorporation into solar-system objects.

- *Molecules in Astrophysics: Probes and Processes*, 1997, IAU Symposium 178 ed. E.F. van Dishoeck (Kluwer, Dordrecht). Up-to-date conference proceedings on astrochemistry.

- *The Physics of the Interstellar Medium and Intergalactic Medium*, 1995, eds. A. Ferrara et al. (ASP Conference series 80). Most up to date book on physics of ISM.

- *Infrared Cirrus and Diffuse Interstellar Clouds*, 1993, eds. R.M. Cutri and W.B. Latter (Astronomical Society of the Pacific Conference Series Volume 58). Good book on diffuse clouds.

- *Dust and Chemistry in Astronomy*, 1993, eds. T.J. Millar and D.A. Williams (IOP publishing, Bristol). Good book on the more chemical aspects.

- *The Evolution of the Interstellar Medium*, 1990, ed. L. Blitz, Astronomical Society of the Pacific Conference Series Volume 12. Collection of reviews on various ISM aspects.

BOOKS ON BASIC ATOMIC AND MOLECULAR SPECTROSCOPY AND PROCESSES

- *Molecular Spectroscopy*, 1998, J.M. Brown (Oxford University Press). Simplest introductory textbook

- *Modern Spectroscopy*, 1996, J.M. Hollas (Wiley, New York, 3'rd edition) (available in paperback). Excellent introduction.

- *Spectra of Atoms and Molecules*, 1995, P.F. Bernath (Oxford University Press). Good textbook

- *Molecules and Radiation*, 1986, J.I. Steinfeld (MIT press, Cambridge). Excellent, more detailed book.

- *Molecular Collisions in the Interstellar Medium*, 1990, D. Flower, Cambridge Astrophysics Series nr. 17 (Cambridge University Press). Specialized book on molecular collisions.
- *Microwave Spectroscopy*, 1955, C.H. Townes and A.L. Schawlow (Dover, New York). Classic reference book on microwave spectroscopy.
- *Molecular Spectra and Molecular Structure I–III*, 1950, G. Herzberg (Van Nostrand Reinhold, Princeton). Classic, timeless set of books on rotational, vibrational and electronic spectroscopy of diatomic and polyatomic molecules.