

1. Record Nr.	UNINA9910438117103321
Titolo	Cross-Calibration of Far UV Spectra of Solar System Objects and the Heliosphere // edited by Eric Quémerais, Martin Snow, Roger-Maurice Bonnet
Pubbl/distr/stampa	New York, NY : , : Springer New York : , : Imprint : Springer, , 2013
ISBN	1-4614-6384-X
Edizione	[1st ed. 2013.]
Descrizione fisica	1 online resource (275 p.)
Collana	ISSI Scientific Report Series ; ; 13
Disciplina	522.68
Soggetti	Solar system Spectrum analysis Astronomy - Observations Space Physics Spectroscopy Astronomy, Observations and Techniques
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Note generali	Description based upon print version of record.
Nota di bibliografia	Includes bibliographical references and index.
Nota di contenuto	Distribution of interstellar H atoms in the heliosphere and backscattered solar Lyman- -- Solar parameters for modeling interplanetary background -- 30 Years of Interplanetary Background Data: A Global View -- Lyman-alpha Models from Messenger and SOHO data -- New Horizons Cruise Observations of Ly Emissions from the Interplanetary Medium -- A New Catalog of Ultraviolet Stellar Spectra -- Absolute Ultraviolet Irradiance of the Moon from SORCE SOLSTICE -- Lyman-alpha Observations of Comet Holmes from SORCE SOLSTICE and SOHO SWAN.
Sommario/riassunto	This book is the result of a working group sponsored by ISSI in Bern, which was initially created to study possible ways to calibrate a Far Ultraviolet (FUV) instrument after launch. In most cases, ultraviolet instruments are well calibrated on the ground, but unfortunately, optics and detectors in the FUV are very sensitive to contaminants and it is very challenging to prevent contamination before and during the test and launch sequences of a space mission. Therefore, ground calibrations need to be confirmed after launch and it is necessary to

keep track of the temporal evolution of the sensitivity of the instrument during the mission. The studies presented here cover various fields of FUV spectroscopy with the exclusion of direct solar UV spectroscopy, including a catalog of stellar spectra, data-sets of lunar Irradiance, observations of comets and measurements of the interplanetary background. Detailed modeling of the interplanetary background is presented as well. This work also includes comparisons of older data-sets with current ones. This raises the question of the consistency of the existing data-sets. Previous experiments have been calibrated independently and comparison of the data-sets may lead to inconsistencies. The authors have tried to check that possibility in the data-sets and when relevant, suggest a correction factor for the corresponding data.
