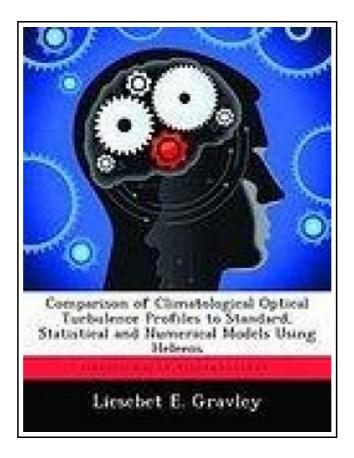
### Comparison of Climatological Optical Turbulence Profiles to Standard, Statistical and Numerical Models Using Heleeos



Filesize: 7.14 MB

### Reviews

A new electronic book with a new point of view. it was writtern extremely completely and beneficial. Its been written in an extremely straightforward way in fact it is simply following i finished reading this publication through which really altered me, alter the way i really believe.

(Dr. Florian Runte)

# COMPARISON OF CLIMATOLOGICAL OPTICAL TURBULENCE PROFILES TO STANDARD, STATISTICAL AND NUMERICAL MODELS USING HELEEOS



Biblioscholar Dez 2012, 2012. Taschenbuch. Book Condition: Neu. 246x189x7 mm. This item is printed on demand - Print on Demand Neuware - Optical turbulence within earth's atmosphere plays a significant role in electromagnetic radiation propagation from a high energy laser. The index of refraction structure constant, Cn2, characterizes turbulent spatial fluctuations due to temperature gradients. These changes in the index of refraction affect the intensity of the laser wave front on its intended target. It is important to characterize this parameter throughout the atmosphere, the boundary layer and above, for its applications regarding the Airborne Laser (ABL) and the Advanced Tactical Laser (ATL). There are several ways to obtain values of optical turbulence, including standard and statistical models, physically-based numerical models, and climatological compilations of observed values. The purpose of this paper is to quantifiably compare standard, statistical, and numerical models of Cn2 to climatological values using the High Energy Laser End-to-End Operational Simulation (HELEEOS), to determine whether or not each model will yield values similar to that of actual measured optical turbulence data. The study shows that HELEEOS is a powerful tool in atmospheric optical turbulence prediction, not only because it has the capability to use standard optical turbulence profiles like Hufnagel-Valley 5/7 (HV 5/7), but it can also incorporate correlated, climatologically-derived turbulence profiles--a technique specifically developed for HELEEOS. The comparative analysis in this research appears to validate the HELEEOS method for correlating climatological Cn2 to other meteorological parameters. Worldwide dwell time estimates vary more than 4 s for tactical low altitude oblique scenarios using this new technique compared to HV 5/7. 120 pp. Englisch.

- Read Comparison of Climatological Optical Turbulence Profiles to Standard, Statistical and Numerical Models Using Heleeos Online
- Download PDF Comparison of Climatological Optical Turbulence Profiles to Standard, Statistical and Numerical Models Using Heleeos

### Relevant Kindle Books



#### Psychologisches Testverfahren

Reference Series Books LLC Nov 2011, 2011. Taschenbuch. Book Condition: Neu. 249x191x7 mm. This item is printed on demand - Print on Demand Neuware - Quelle: Wikipedia. Seiten: 100. Kapitel: Myers-Briggs-Typindikator, Keirsey Temperament Sorter, DISG,...

Download Book »



#### Programming in D

Ali Cehreli Dez 2015, 2015. Buch. Book Condition: Neu. 264x182x53 mm. This item is printed on demand - Print on Demand Neuware - The main aim of this book is to teach D to readers...

Download Book »



### Six Steps to Inclusive Preschool Curriculum: A UDL-Based Framework for Children's School Success

Brookes Publishing Co. Paperback. Book Condition: new. BRAND NEW, Six Steps to Inclusive Preschool Curriculum: A UDL-Based Framework for Children's School Success, Eva M. Horn, Susan B. Palmer, Gretchen D. Butera, Joan A. Lieber, How...

Download Book »



### You Shouldn't Have to Say Goodbye: It's Hard Losing the Person You Love the Most

Sourcebooks, Inc. Paperback / softback. Book Condition: new. BRAND NEW, You Shouldn't Have to Say Goodbye: It's Hard Losing the Person You Love the Most, Patricia Hermes, Thirteen-year-old Sarah Morrow doesn't think much of the...

Download Book »



### Houdini's Gift

Independent Publishers Group (IPG) - Chicago Review Press, 2009. Hardcover. Book Condition: New. Revisiting well-loved characters from a past adventure, this picture book presents animal-loving Ben with the challenge of having another pet after losing...

Download Book »



### Very Short Stories for Children: A Child's Book of Stories for Kids

Paperback. Book Condition: New. This item is printed on demand. Item doesn't include CD/DVD.

Download ePub »



#### The Mystery of God's Evidence They Don't Want You to Know of (Paperback)

Createspace, United States, 2012. Paperback. Book Condition: New. 276 x 214 mm. Language: English . Brand New Book \*\*\*\*\* Print on Demand \*\*\*\*\*. Save children's lives learn the discovery of God Can we discover God?

Download ePub »



### Frances Hodgson Burnett's a Little Princess

Penguin Young Readers Group. Paperback / softback. Book Condition: new. BRAND NEW, Frances Hodgson Burnett's a Little Princess, Deborah Hautzig, N/A, Natalie Carabetta, The All Aboard Reading series features stories that capture beginning readers' imagination

Download ePub »



## Children's Handwriting Book of Alphabets and Numbers: Over 4,000 Tracing Units for the Beginning Writer (Paperback)

Createspace, United States, 2015. Paperback. Book Condition: New. 254 x 203 mm. Language: English . Brand New Book \*\*\*\*\* Print on Demand \*\*\*\*\*. The Children s Handwriting Book of Alphabets and Numbers provides extensive focus on

Download ePub »



### No Friends?: How to Make Friends Fast and Keep Them (Paperback)

Createspace, United States, 2014. Paperback. Book Condition: New. 229 x 152 mm. Language: English . Brand New Book \*\*\*\*\* Print on Demand \*\*\*\*\*. Do You Have NO Friends? Are you tired of not having any

Download ePub »