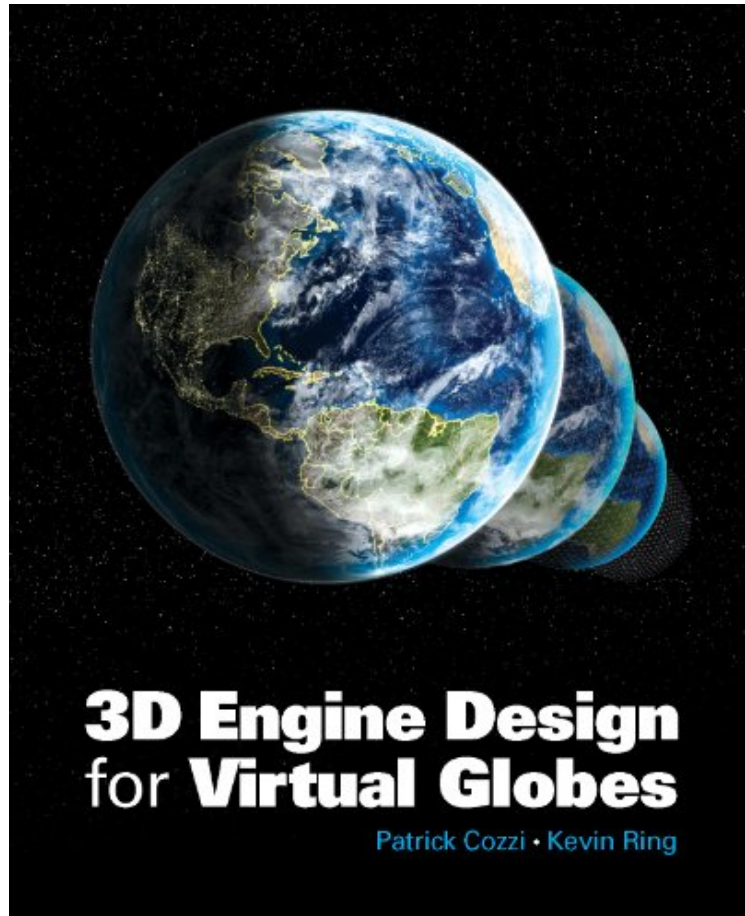


(Free read ebook) 3D Engine Design for Virtual Globes

3D Engine Design for Virtual Globes

Von Patrick Cozzi, Kevin Ring
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Von Patrick Cozzi, Kevin Ring : 3D Engine Design for Virtual Globes before purchasing it in order to gage whether or not it would be worth my time, and all praised 3D Engine Design for Virtual Globes:

KundenrezensionenHilfreichste Kundenrezensionen0 von 0 Kunden fanden die folgende Rezension hilfreich. Kompakt, aber einige LckenVon Patrick PolzinInsgesamt ist das Buch fr Einsteiger sehr gut geeignet, da die Autoren sehr ausfhrlich auf die Problematik von Planetensystemen eingehen. Sehr schn ist auch, dass der Druck in Farbe erfolgt, wodurch das Nachvollziehen der Inhalte leichter flt.Einen Punkt habe ich aus folgendem Grund abgezogen: Inhaltlich gibt es einige Lcken, besonders im mathematischen Teil und den Koordinatensystemen. Zudem werden die Probleme zwar als Text gelst, die praktische Lsung ist jedoch mangelware und kann nur in der Demo betrachtet werden.0 von 0 Kunden fanden die folgende Rezension hilfreich. Bestes Buch zum ThemaVon CustomerMeiner meinung nach das beste Buch zu dem sehr speziellen Thema. Es knnte etwas ausfhrlicher zum Thema verwendeter OpenGL Befehle sein - es gibt eine groe Menge Code, der nicht im Buch auftaucht. Leider gingen die Beispiele auf meinem Laptop nicht (die Intel GPU nur bis OpenGL 2.0, Beispiele in 3.x) - man kann aber den Renderer losgelst

nochmal implementieren. Trotzdem sehr gut gemachtes Buch und zu empfehlen, insbesondere in Verbindung mit der Beispielimplementierung.

Kurzbeschreibung Supported with code examples and the authors real-world experience, this book offers the first guide to engine design and rendering algorithms for virtual globe applications like Google Earth and NASA World Wind. The content is also useful for general graphics and games, especially planet and massive-world engines. With pragmatic advice throughout, it is essential reading for practitioners, researchers, and hobbyists in these areas, and can be used as a text for a special topics course in computer graphics. Topics covered include: Rendering globes, planet-sized terrain, and vector data Multithread resource management Out-of-core algorithms Shader-based renderer design

3D Engine Design for Virtual Globes presents invaluable practical knowledge for building interactive 3D worlds and serves as a great reference for the different rendering algorithms and their tradeoffs. You will find a copy at my desk. Quarup Barreirinhas, Google Earth Software Engineer This is a long overdue book covering techniques essential for the design and implementation of virtual globe engines and for high-fidelity planetary scale terrain rendering applications. Written by experienced developers with a consistent and very practical approach, the book provides a comprehensive evaluation of modern algorithms and techniques for terrain and vector data rendering, 3D engine design, multithreading, and much more. I definitely recommend it to everyone implementing or interested in the methods used in virtual globes, simulations, large-scale visualizations, and GIS applications. Brano Kemen, Outerra This book is must have literature for all software developers building virtual worlds. Based on the experience of its authors, this book covers all essential aspects of terrain rendering: mathematical background, geographic information systems basics, information about how to handle massive datasets, precise rendering, multithreading, and some state-of-the-art algorithms. It is richly illustrated with pictures and code, using a modern fully shader-based approach with OpenGL 3.3 core profile and C#. Aleksandar Dimitrijevi, University of Ni

3D Engine Design for Virtual Globes provides a fine guide to engine design and algorithms for virtual globe applications such as Google Earth packed with formulas and details on simulations, visualization and GIS applications a winner for any technical collection. Midwest Book , November 2011 What the authors actually do is build a very nice, modern, OpenGL rendering engine. the code content is quite digestible and easy to follow, and we can imagine eager readers swarming the book s website in order to download the entire codebase. Asides from the very usable 3D engine provided, one can also find oodles of interesting discussions on how to solve Depth Buffer precision-related problems and how to deal with the limited coordinate precision afforded by the float representation we must issue bonus points for dealing with multi-threading head on We d also recommend that one should play with all the "Try this" challenges in the book, they re good fun both the beginner and the more experienced practitioner has something in store hidden between the black covers. Alex Voicu, Beyond3D, October 2011

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