



Distributed Computing with Python

Francesco Pierfederici

Download now

Click here if your download doesn"t start automatically

Distributed Computing with Python

Francesco Pierfederici

Distributed Computing with Python Francesco Pierfederici

Key Features

- You'll learn to write data processing programs in Python that are highly available, reliable, and fault tolerant
- Make use of Amazon Web Services along with Python to establish a powerful remote computation system
- Train Python to handle data-intensive and resource hungry applications

Book Description

CPU-intensive data processing tasks have become crucial considering the complexity of the various big data applications that are used today. Reducing the CPU utilization per process is very important to improve the overall speed of applications.

This book will teach you how to perform parallel execution of computations by distributing them across multiple processors in a single machine, thus improving the overall performance of a big data processing task. We will cover synchronous and asynchronous models, shared memory and file systems, communication between various processes, synchronization, and more.

What You Will Learn

- Get an introduction to parallel and distributed computing
- See synchronous and asynchronous programming
- Explore parallelism in Python
- Distributed application with Celery
- Python in the Cloud
- Python on an HPC cluster
- · Test and debug distributed applications

About the Author

Francesco Pierfederici is a software engineer who loves Python. He has been working in the fields of astronomy, biology, and numerical weather forecasting for the last 20 years.

He has built large distributed systems that make use of tens of thousands of cores at a time and run on some of the fastest supercomputers in the world. He has also written a lot of applications of dubious usefulness but that are great fun. Mostly, he just likes to build things.

Table of Contents

- 1. An Introduction to Parallel and Distributed Computing
- 2. Asynchronous Programming
- 3. Parallelism in Python
- 4. Distributed Applications with Celery
- 5. Python in the Cloud

- 6. Python on an HPC Cluster
- 7. Testing and Debugging Distributed Applications
- 8. The Road Ahead



Read Online Distributed Computing with Python ...pdf

Download and Read Free Online Distributed Computing with Python Francesco Pierfederici

From reader reviews:

Sally McGarvey:

What do you in relation to book? It is not important along with you? Or just adding material when you really need something to explain what you problem? How about your spare time? Or are you busy man? If you don't have spare time to complete others business, it is gives you the sense of being bored faster. And you have extra time? What did you do? Every person has many questions above. They need to answer that question because just their can do that. It said that about e-book. Book is familiar on every person. Yes, it is proper. Because start from on jardín de infancia until university need this kind of Distributed Computing with Python to read.

Phyllis Force:

The knowledge that you get from Distributed Computing with Python could be the more deep you looking the information that hide inside words the more you get serious about reading it. It does not mean that this book is hard to know but Distributed Computing with Python giving you joy feeling of reading. The article writer conveys their point in certain way that can be understood by simply anyone who read that because the author of this guide is well-known enough. This particular book also makes your vocabulary increase well. That makes it easy to understand then can go with you, both in printed or e-book style are available. We highly recommend you for having this Distributed Computing with Python instantly.

Linda Bryant:

Do you have something that you want such as book? The book lovers usually prefer to choose book like comic, quick story and the biggest some may be novel. Now, why not attempting Distributed Computing with Python that give your entertainment preference will be satisfied through reading this book. Reading addiction all over the world can be said as the method for people to know world considerably better then how they react when it comes to the world. It can't be mentioned constantly that reading practice only for the geeky man or woman but for all of you who wants to be success person. So, for every you who want to start reading through as your good habit, you could pick Distributed Computing with Python become your current starter.

Amy Smith:

Do you like reading a publication? Confuse to looking for your favorite book? Or your book was rare? Why so many problem for the book? But just about any people feel that they enjoy regarding reading. Some people likes looking at, not only science book but additionally novel and Distributed Computing with Python or perhaps others sources were given expertise for you. After you know how the fantastic a book, you feel need to read more and more. Science book was created for teacher or maybe students especially. Those books are helping them to put their knowledge. In different case, beside science guide, any other book likes Distributed Computing with Python to make your spare time more colorful. Many types of book like this.

Download and Read Online Distributed Computing with Python Francesco Pierfederici #G6OT0XS4LCZ

Read Distributed Computing with Python by Francesco Pierfederici for online ebook

Distributed Computing with Python by Francesco Pierfederici Free PDF d0wnl0ad, audio books, books to read, good books to read, cheap books, good books, online books, books online, book reviews epub, read books online, books to read online, online library, greatbooks to read, PDF best books to read, top books to read Distributed Computing with Python by Francesco Pierfederici books to read online.

Online Distributed Computing with Python by Francesco Pierfederici ebook PDF download

Distributed Computing with Python by Francesco Pierfederici Doc

Distributed Computing with Python by Francesco Pierfederici Mobipocket

Distributed Computing with Python by Francesco Pierfederici EPub