

Deep Learning Institute 사전 준비 사항

(부록 : QWIKLAB 사용법 안내)

Step1. 사이트 접속

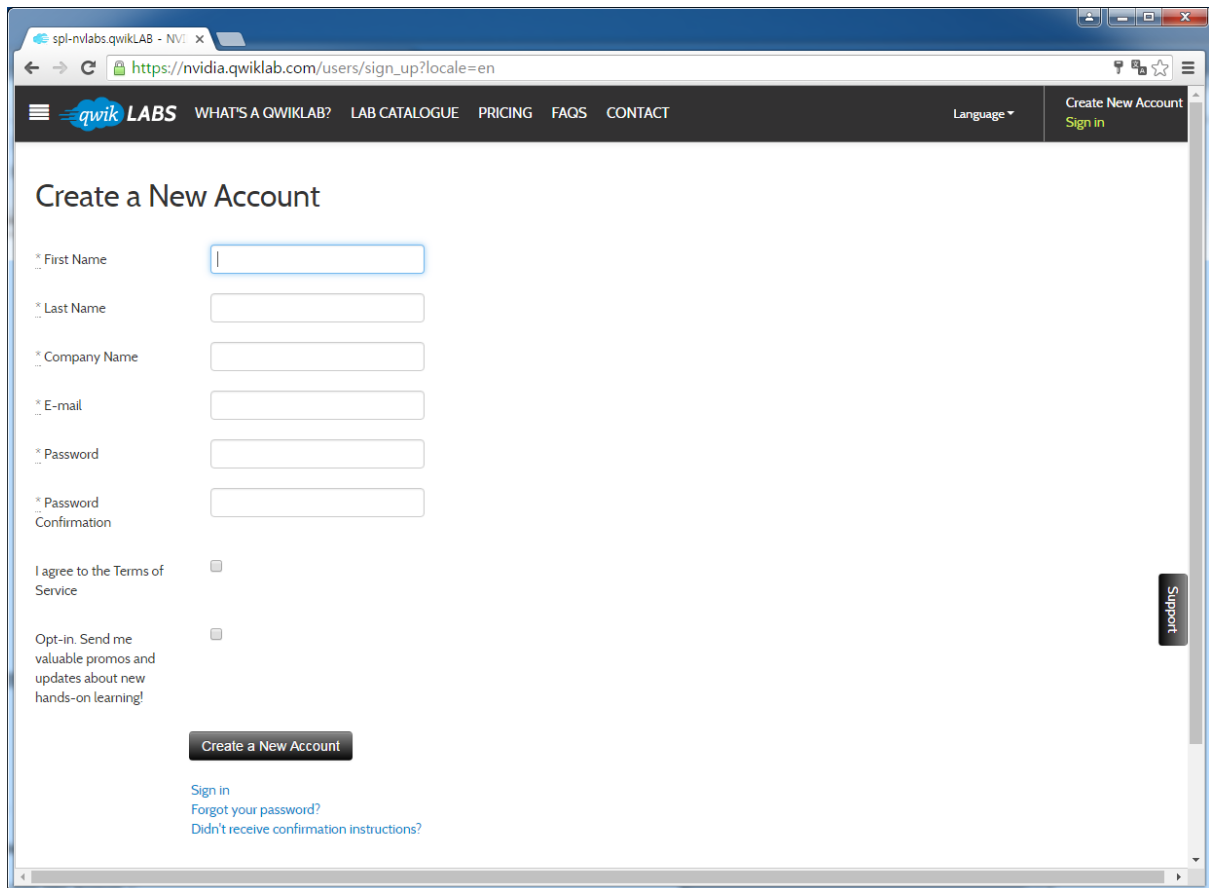
<http://nvidia.qwiklab.com>

The screenshot displays the NVIDIA QwikLab website interface. At the top, there is a navigation bar with the Qwik Labs logo and links for 'WHAT'S A QWIKLAB?', 'LAB CATALOGUE', 'PRICING', 'FAQS', and 'CONTACT'. On the right side of the navigation bar, there are options for 'Language', 'Create New Account', and 'Sign in'. The main content area features a large blue header with the text 'Real training, real-time, real environments.' and a sub-header 'Get hands-on practice working with cloud technologies and software. Train on-demand and learn at your own pace.' Below the header, there is a search bar labeled 'Search for a Lab:' with a search button and a 'Browse Lab Catalogue' button. To the right, there is a 'Browse Learning Quests (Lab Collections):' section with tabs for 'Languages', 'Technologies', and 'Domains'. The 'C/C++ Getting Started' quest is expanded, showing a description: 'Learn how to program GPUs with C/C++. With millions of GPU compute enabled GPUs sold to date, software developers, scientists and researchers are finding broad-ranging uses for GPU computing - Learn More'. It also displays statistics: 'Total Labs: 4', 'Total Lab Credits: 40', and 'Total Time: 05 h:42 m'. A 'Badge Earned' section shows a 'C/C++ Getting Started' badge. Below this, there are expandable sections for 'Python Getting Started', 'Fortran Getting Started', and 'MATLAB'. At the bottom of the page, there is a 'Getting Started?' section with a downward arrow.

Step2. 이상단 회원 가입(Create New Account) 버튼 클릭

입력사항: 이름(First Name), 성(Last Name), 소속 (Company Name), E-mail, Password 입력합니다.

(로그인시 사용되는 ID는 E-mail 주소임)



The screenshot shows a web browser window displaying the 'Create a New Account' page on the qwik LABS website. The browser's address bar shows the URL: https://nvidia.qwiklab.com/users/sign_up?locale=en. The page header includes the qwik LABS logo and navigation links: WHAT'S A QWIKLAB?, LAB CATALOGUE, PRICING, FAQs, and CONTACT. There are also links for 'Language' and 'Create New Account Sign in'. The main content area is titled 'Create a New Account' and contains the following form fields:

- * First Name
- * Last Name
- * Company Name
- * E-mail
- * Password
- * Password Confirmation

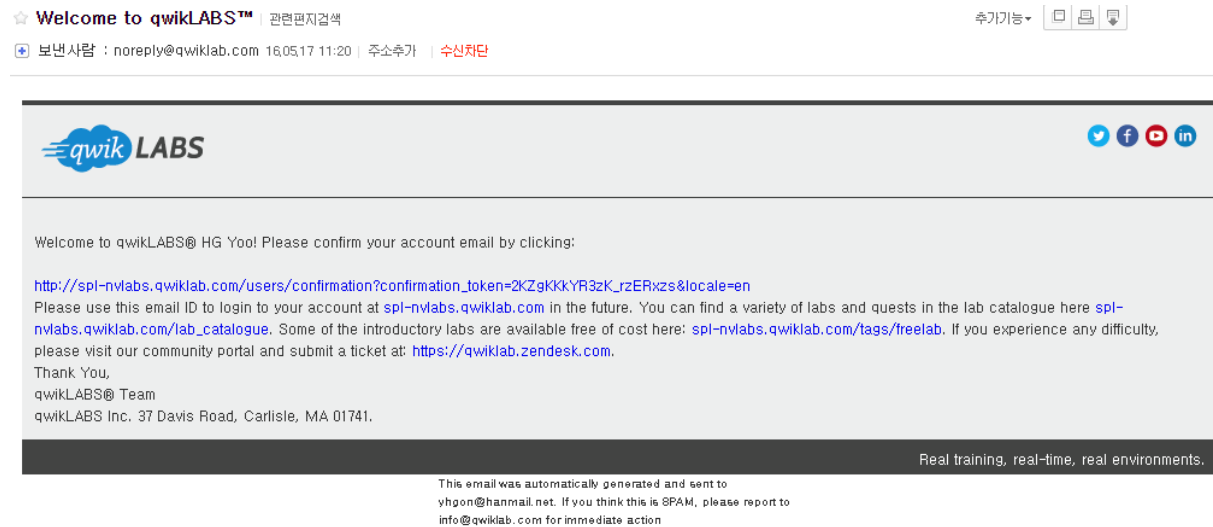
Below the form fields, there are two checkboxes:

- I agree to the Terms of Service
- Opt-in. Send me valuable promos and updates about new hands-on learning!

At the bottom of the form, there is a 'Create a New Account' button. Below the button, there are three links: 'Sign in', 'Forgot your password?', and 'Didn't receive confirmation instructions?'. A 'Support' button is visible on the right side of the page.

Step3. 인증메일 확인 및 계정 활성화

등록한 메일의 메일함을 열어보면 인증메일이 존재합니다. 이를 열어서 파란색 첫줄을 클릭해주면 인증확인이 됩니다.



Step 4. Qwiklab 메일 발송

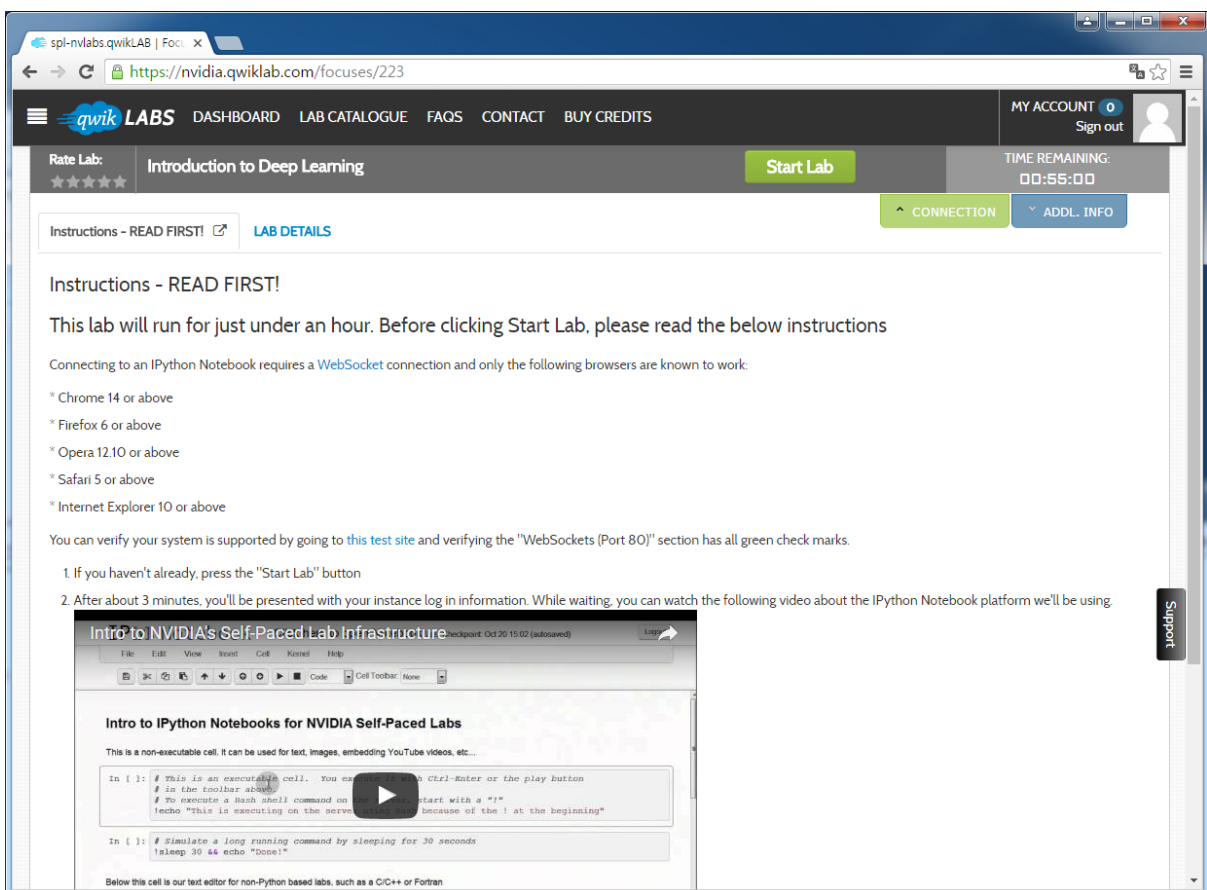
이름, 전화번호, 계정 등록시 사용한 email 을 행사 담당자에게 발송해야 합니다.

메일 주소는 다음과 같습니다 (nvidiakor@gmail.com)

(부록 : QWIKLAB 사용법 안내)

로그인 후 세션 실행

Introduction to Accelerated Computing 세션을 선택한 후 Start Lab 버튼을 클릭하여 서버를 켜줍니다. 아마존 서버를 켜는데 약 4분 정도의 시간이 소요됩니다.



아마존 서버 켜는 중..

Start 버튼을 누르고 약 4분 정도 소요됨.

서버가 켜지는 동안 **Instruction**을 읽어 볼 것을 권장합니다. **IPython Notebook**의 원활한 접속을 위해 최신 브라우저와 원활한 네트워크 접속 환경이 필요합니다.

The screenshot shows a web browser window displaying the QwikLABS interface. The URL is <https://nvidia.qwiklab.com/focuses/37>. The page title is "Introduction to Accelerated Computing". The status is "Launching". The time remaining is 00:55:00. The page includes a table with the following data:

Setup Time (min.)	4
Duration (min.)	45
Access (min.)	55

Tags: self-paced, C, C++, CUDA, OpenACC, Python, free. Levels: Introductory. Lab Description: Learn about the three techniques for accelerating code on a GPU; Libraries, Directives like OpenACC, and writing code directly in CUDA-enabled languages. In 45 minutes, you will work through a few different exercises demonstrating the potential speed-ups and ease of use of porting to the GPU. Date Created: April 14, 2016 09:40 AM. AWS Region: [us-east-1] US East (N. Virginia).

Footer links: About, Blog, Partner Solutions, Privacy Policy, Terms Of Service, Dashboard, Lab Catalogue, Faqs, Contact, Buy Credits. Copyright: © qwikLABS® '12-'16; a computer lab for everyone v.toscana(0512-0). Social media icons for Twitter, Facebook, YouTube, and LinkedIn are also present.

아마존 서버 작동

Click Here 버튼을 클릭하여 Lab을 시작합니다.

The screenshot shows a web browser window with the URL <https://nvidia.qwiklab.com/fociuses/37>. The page header includes the QwikLABS logo and navigation links: DASHBOARD, LAB CATALOGUE, FAQs, CONTACT, and BUY CREDITS. On the right, there is a 'MY ACCOUNT' section with a 'Sign out' button and a user profile icon.

The main content area is titled 'Rate Lab: Introduction to Accelerated Computing' and features a star rating system. An 'End' button is visible. A 'TIME REMAINING' indicator shows '00:55:00'. Below this, there are two main sections: 'Lab Connection' and 'Connection'.

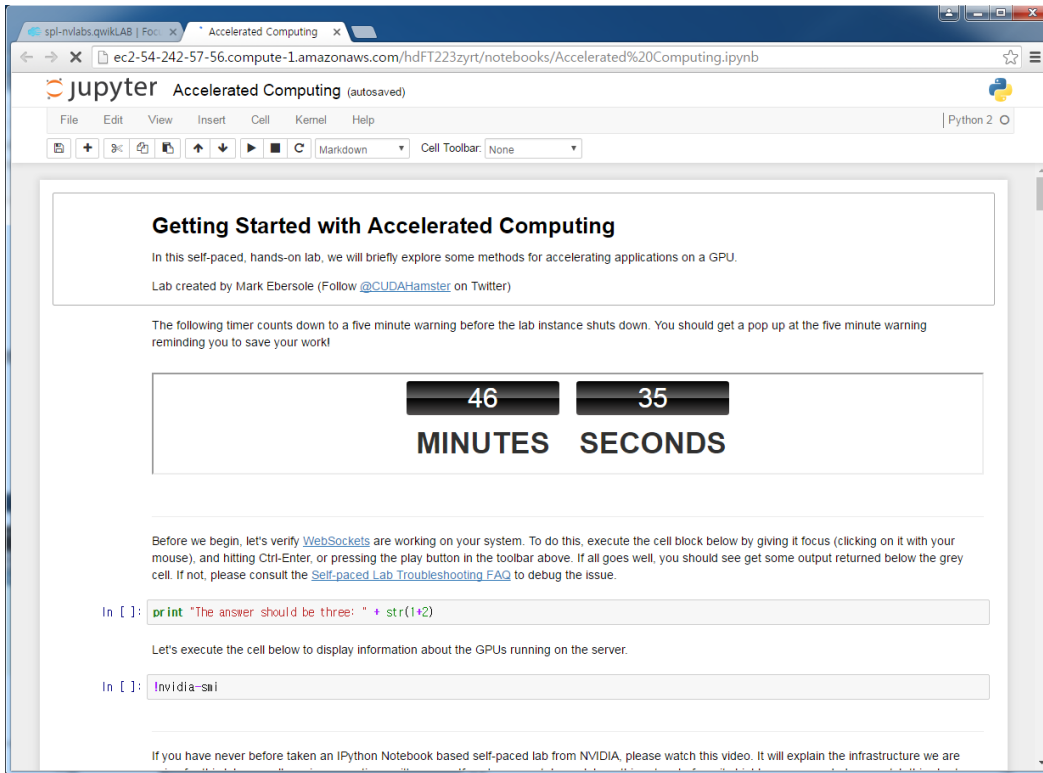
Lab Connection: Contains instructions to follow lab instructions and a red warning box: **Warning:** Please do not transmit any data into the AWS resources used in this lab that are not related to qwikLABS® or the hands-on lab you are taking.

Connection: Shows a password field with the text 'hdFT223zyrt' and a 'Click here to launch your lab.' link. There are also buttons for '^ CONNECTION' and 'v ADDL. INFO'.

Below the connection section, there are browser compatibility requirements: Opera 12.10 or above, Safari 5 or above, and Internet Explorer 10 or above. A paragraph explains how to verify system support by checking 'WebSockets (Port 80)'. A numbered list provides steps for starting the lab, including copying the password, clicking the provided link, pasting the password, and following in-lab instructions.

The footer contains a grid of links: About, Blog, Partner Solutions, Privacy Policy, Terms Of Service, Dashboard, Lab Catalogue, FAQs, Contact, and Buy Credits. On the right, there are social media icons for Twitter, Facebook, YouTube, and LinkedIn, along with the copyright notice: © qwikLABS® '12-'16; a computer lab for everyone v.toscana(0512-0). A vertical 'Support' button is located on the right edge of the page.

랩을 시작하면 Ipython 노트북이 실행됩니다.



Python 입력 Cell에 마우스 클릭 후 실행버튼을 클릭하면 서버 측 결과를 확인할 수 있다.

특히, nvidia-smi 명령을 통해 아마존 서버에 nvidia GPU GRID K520이 장착된 것을 확인할 수 있습니다.

