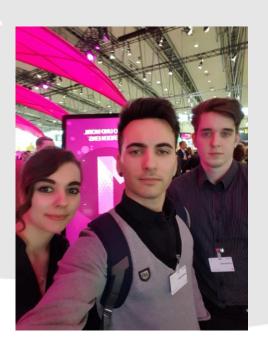


### "CLOUD KINDERGARTEN"



Apprentices starting with





#### **AGENDA**



- **1.1** Who Are We?
- 1.2 Our Workflow
- 2. TelekomCLOUD + OpenStack
  - 2.1 Refcard Overview
  - 2.2 Our Deployment
- 3. OpenStack In Practice
  - **3.1** CI / CD in Git
  - **3.2** Video "Creating a tenant with OpenStack"
- **4.** Q&A



## 1. INTRODUCTION

 $ag{.}\cdot$ 

#### 1.1 WHO ARE WE? - MENTOR



#### Person

• Name: Frank Kloeker

• From : Berlin

#### Education

- 27 years of experience in Operations
- 10 years Examiner on Chamber of Commerce and Industry

#### Today

- Applicationmanagement for Cloud hosting platform
- personal point of contact for Apprentices
- Company : Deutsche Telekom AG
- Business Unit: Business Applications & Cloud Services



1. Introduction

2. TelekomCLOUD + OpenStack

3. OpenStack In Practice

#### 1.1 WHO ARE WE? - APPRENTICE



#### Person

• Name : Adriano Perri

• Age: 23

• From: Berlin



#### Education

- Abitur
- studied 2 semester geoecology
- Apprenticeship until 2018

#### Today

- Vocation: management assistant in IT systems
- Company : Deutsche Telekom AG
- Business Unit: Business Applications & Cloud Services

1. Introduction

2. TelekomCLOUD + OpenStack

3. OpenStack In Practice

#### 1.1 WHO ARE WE? - STUDENT



#### Person

Name : Janika Schäfer

• Age: 21

• From: Berlin

#### Education

Vocation : IT systems technician

• with Abitur

finished 2015

#### Today

- studying : bachelor of engineering in communication & media computer science
- Company: Deutsche Telekom AG
- Business Unit: Business Applications & Cloud Services

1. Introduction

Practice

4. Q & A



3. OpenStack In



#### 1.1 WHO ARE WE? - APPRENTICE



#### Person

Name : Oliver Klippel

• Age: 23

• From: Berlin



#### Education

- Abitur
- 1 semester computer science & 1 semester media computer science
- Apprenticeship until 2018

#### Today

- Vocation : IT specialist for systemintegration
- Company: Deutsche Telekom AG
- Business Unit : Business Applications & Cloud Services

1. Introduction

2. TelekomCLOUD + OpenStack

3. OpenStack In Practice

#### 1.2 OUR WORKFLOW - A. PERRI



- 4) Create Refcard
- writing down (structured)
- comply with the corporate design
- use supporting illustrations

- 3 Documentation
- gather information unfiltered
- screen information
- organize them

2 Conception

- what is important?
- what is asked for?
- time management

- 1) Get an Overview
- understand the task/topic
- clear up questions
- get inspired by other refcards

1. Introduction

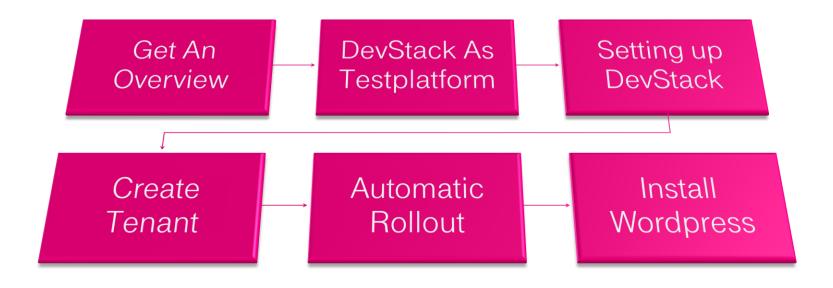
- 2. TelekomCLOUD + OpenStack
- 3. OpenStack In Practice

4. Q & A

ERLEBEN, WAS VERBINDET.

#### 1.2 OUR WORKFLOW - J. SCHÄFER/O. KLIPPEL 🙋







#### 1.2 OUR WORKFLOW







1. Introduction

- OpenStack Summit 2016 -

3. OpenStack In Practice

# 2. TELEKOMCLOUD + OPENSTACK

#### 2.1 REFCARD - OVERVIEW





Picture: Refcard Telekom SMB Cloud

1. Introduction 2. TelekomCLOUD 3. OpenStack In Practice 4. Q & A

#### 2.2 OUR DEPLOYMENT - SERVICES WE USE



| Service Name                           | Function                                  |
|--|---|
| Nova (Compute)                         | Virtual Machine Management                |
| Neutron (Networking)                   | Network Management                        |
| Cinder (Block Storage)                 | Storage Resource Management               |
| Keystone (Identity Service)            | Identity Management                       |
| Glance (Image Service)                 | Image Management                          |
| RabbitMQ (Message Oriented Middleware) | Communication Management                  |
| Razor (Bare-Metal Provisioning)        | Process of Installing an Operating System |
| Ceph S3 (Object Storage)               | Storage Resource Management               |

1. Introduction

2. TelekomCLOUD + OpenStack 3. OpenStack In Practice



#### 2.2 OUR DEPLOYMENT - DATACENTER

- brand new datacenter Biere near Magdeburg
- largest cloud datacenter in germany
- 40.000 m<sup>2</sup> area
- high security through complex security systems
- 12 emergency power generators
- high availability
- we give the resources you need!



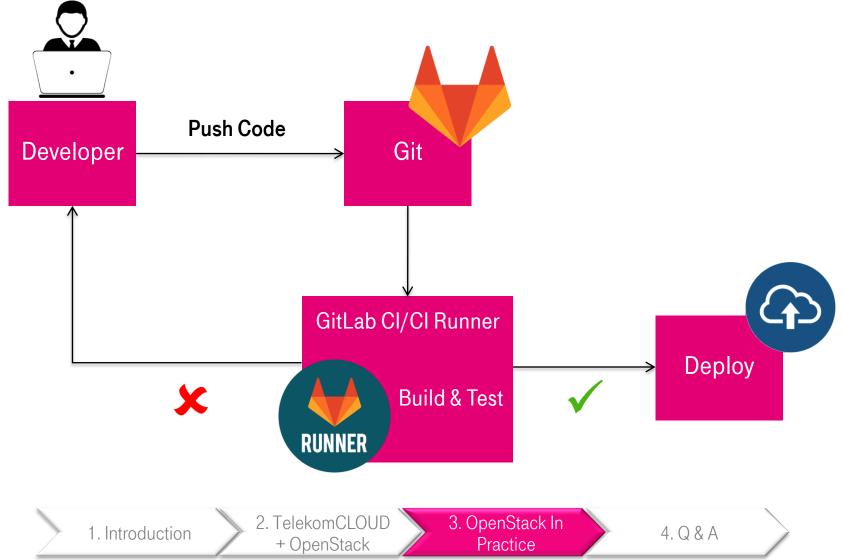
1. Introduction

2. TelekomCLOUD + OpenStack

# 3. OPENSTACK IN PRACTICE

#### 3.1 OPENSTACK IN PRACTICE - CI/CD IN GIT





#### 3.2 OPENSTACK IN PRACTICE - VIDEO

# Cloud Kindergarten – Creating a tenant with OpenStack



2. TelekomCLOUD + OpenStack

3. OpenStack In Practice



## THANK YOU FOR YOUR ATTENTION!!



#### **SOURCES**



#### Informations

- https://www.openstack.org/
- https://dzone.com/refcardz/getting-started-openstack-most
- http://cloud-computing-blog.eu/was-ist-jetzt-eigentlich-cloud-computing/
- Other Sources: Aiolos System Description.pdf; Telekom Small Business Cloud\_Refcard for ISVs.pdf

#### **Pictures**

- http://www.ofekcloud.com/media/images/1e7b5ca3-8b2e-4e2e-9898-5df978f0218aimage14.jpeg (Slide #10 CC)
- <a href="http://www.all-stars.de/blog/wp-content/uploads/2014/04/planung.jpg">http://www.all-stars.de/blog/wp-content/uploads/2014/04/planung.jpg</a> (Slide #10 Planning)
- <a href="http://www.maclife.de/ratgeber/microsoft-office-ios-jetzt-icloud-unterstuetzung-10062588.html">http://www.maclife.de/ratgeber/microsoft-office-ios-jetzt-icloud-unterstuetzung-10062588.html</a> (Slide #10 Office Tools)
- http://yourdost.com/blog/2016/02/how-to-become-more-creative.html (Slide #10 Creative)
- <a href="http://www.embritas.lt/project/duomenu-apdorojimo-centras/?lang=de">http://www.embritas.lt/project/duomenu-apdorojimo-centras/?lang=de</a> (Slide #14 Datacenter Biere)
- <a href="https://www.openstack.org/brand/openstack-logo/logo-download/">https://www.openstack.org/brand/openstack-logo/logo-download/</a> (Slide #10,#1 OpenStack Logo)
- <a href="https://cloud.telekom.de/">https://cloud.telekom.de/</a> (Slide #14 TelekomCLOUD)
- <a href="https://gitlab.com/uploads/project/avatar/250833/runner-logo.png">https://gitlab.com/uploads/project/avatar/250833/runner-logo.png</a> (Slide #17 Git Runner Logo)
- <a href="http://www.autotestingtools.com/devops">http://www.autotestingtools.com/devops</a> (Slide #17 Deploy Logo)
- <a href="https://d30y9cdsu7xlg0.cloudfront.net/png/27703-200.png">https://d30y9cdsu7xlg0.cloudfront.net/png/27703-200.png</a> (Slide #17 Developer)
- <a href="https://gitlab.com/uploads/project/avatar/13083/gitlab-logo-square.png">https://gitlab.com/uploads/project/avatar/13083/gitlab-logo-square.png</a> (Slide #17 GitLab Logo)
- <a href="http://copting.de/wp-content/uploads/kreuz-rot.png">http://copting.de/wp-content/uploads/kreuz-rot.png</a> (Slide #17 cross)
- http://copting.de/wp-content/uploads/Haken-gr%C3%BCn-284x300.png (Slide #17 hook)
- https://de.pinterest.com/pin/556053885218068326/ (Slide #19 Background)

## 4. QUESTIONS & ANSWERS