

# Kubernetes and ParticipAct: a brief analysis of how the Kubernetes containerisation platform works, using the deployment of ParticipAct as a case study

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## ABSTRACT

Kubernetes is a new trending platform at Platform as a Service level, through orchestration and coordination of containers developers could deploy anything on it. Developed by Google for its internal software deployment, Kubernetes grew up quickly among devops and developers communities because offers a lot of support and customizations.

Kubernetes also became very popular among software architects for its built-in support to microservices architecture, using Services, Deployment and Replication Controllers and so on and so forth companies could easily deploy their microservices in controlled environment.

ParticipAct is a mobile crowd sensing project where users could actively or passively cooperate with platform sending device sensors data and/or performing some active task like take a picture on a given location.

The main purposes of this work are:

- Brief analysis of Kubernetes platform
- Containerization of ParticipAct platform
- Deployment of ParticipAct platform on kubernetes

