

Kubernetes demonstration

Administrative tools and web application

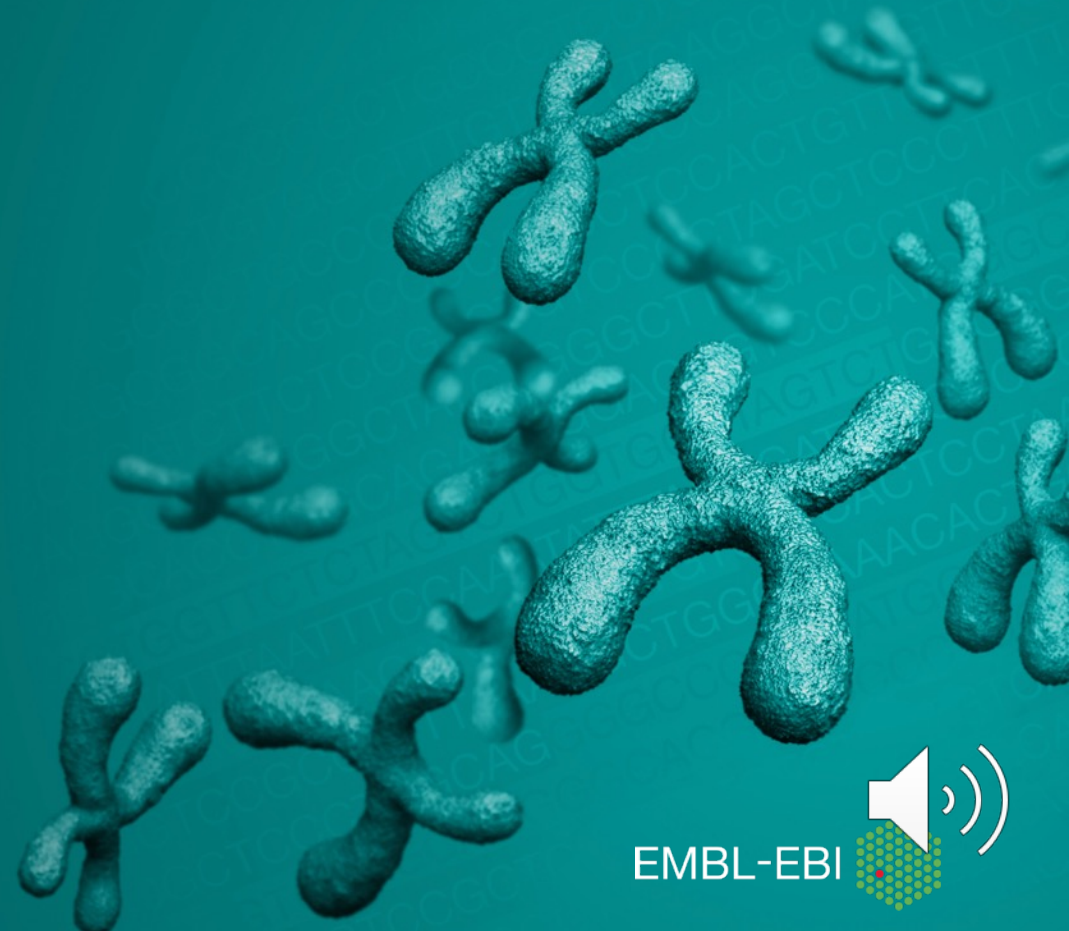


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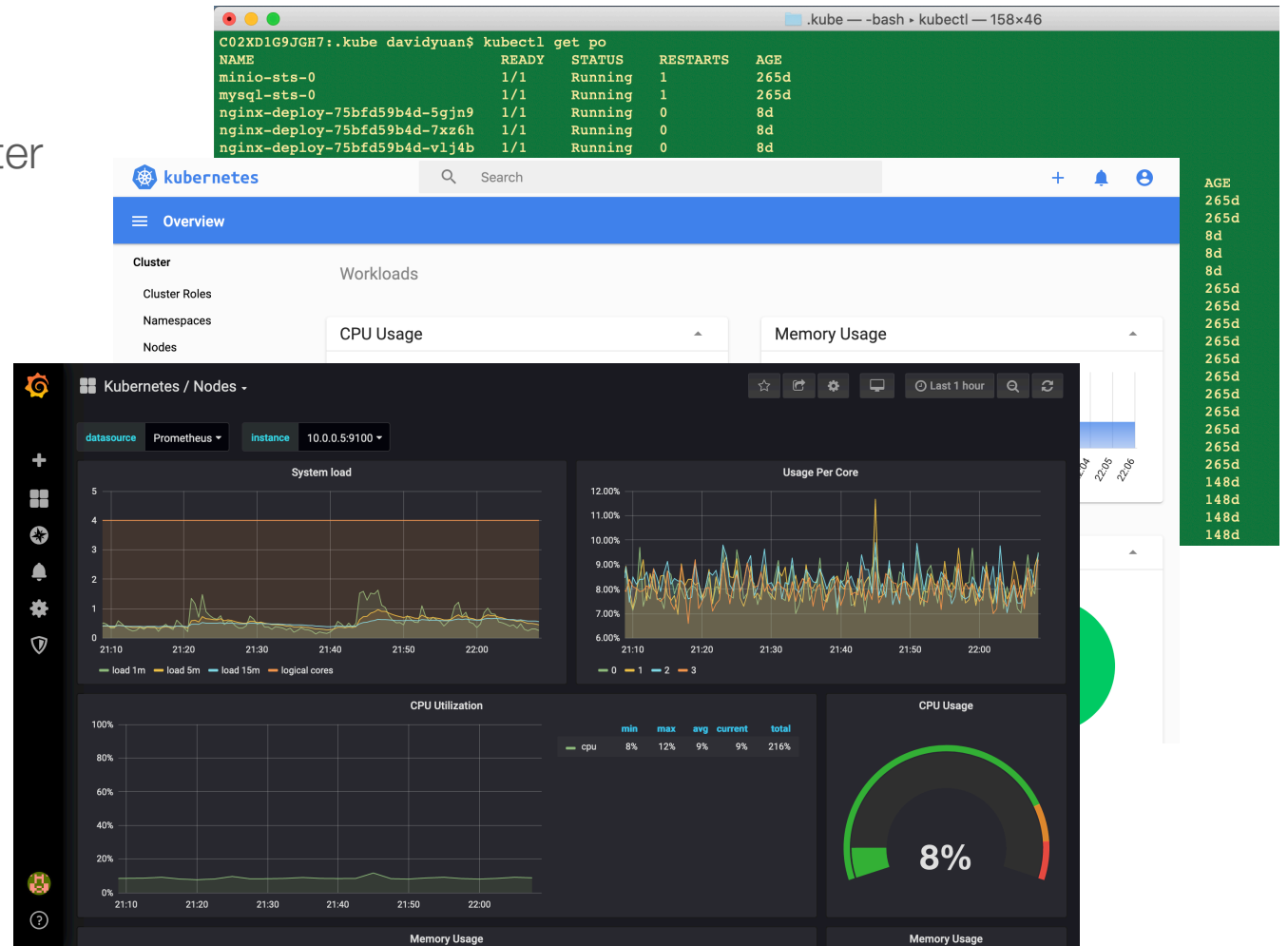
Technology and Science Integration

European Bioinformatics Institute, EMBL

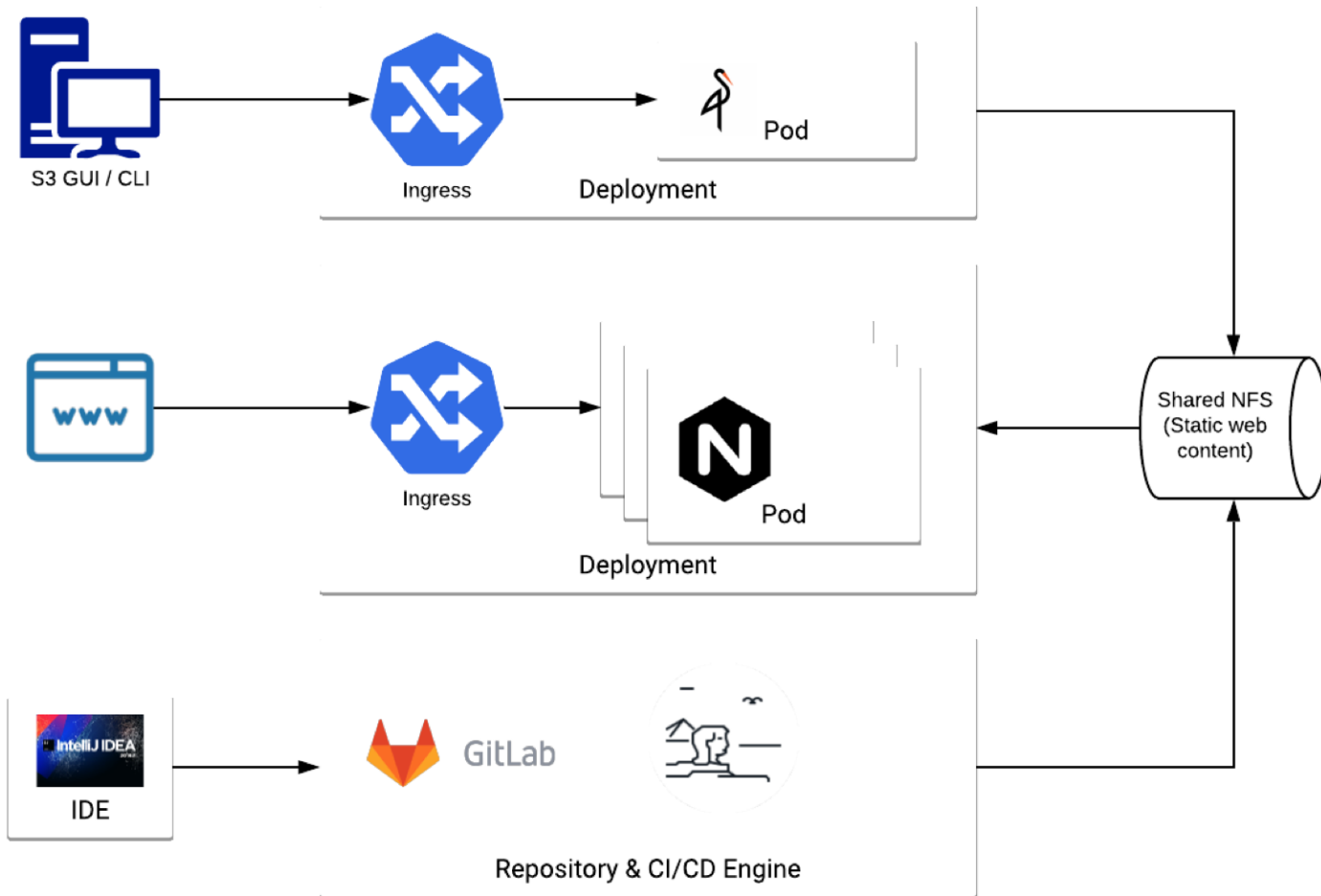


Kubernetes Demonstration

- Credentials and Floating IP [FIP]
 - Accessing a newly created K8S cluster
- Kubectl
 - Interacting with the cluster with CLI
- Kubernetes Dashboard
 - Interacting with the cluster with GUI
- Prometheus and Grafana
 - Monitoring the cluster with GUI



Kubernetes Demonstration



- End-to-end: a real live web application
 - Application for web (NGINX)
 - Persistent volume claim shared between Minio and NGINX
 - Stateful set and service for NGINX
 - Ingress to expose service externally
 - Data Loading via S3 (Minio)
 - Minio deployment and service
 - Deleting Minio after using it for better security
 - Integrating NGINX, NFS and Minio