

Is it time to put your pet Kubernetes down?

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[@appvia_io](https://twitter.com/appvia_io)

 **Ask a question!** 



Hello

Reminder what is Pets vs Cattle?



The before times





HELLO
MY NAME IS

Bob



2022(?)



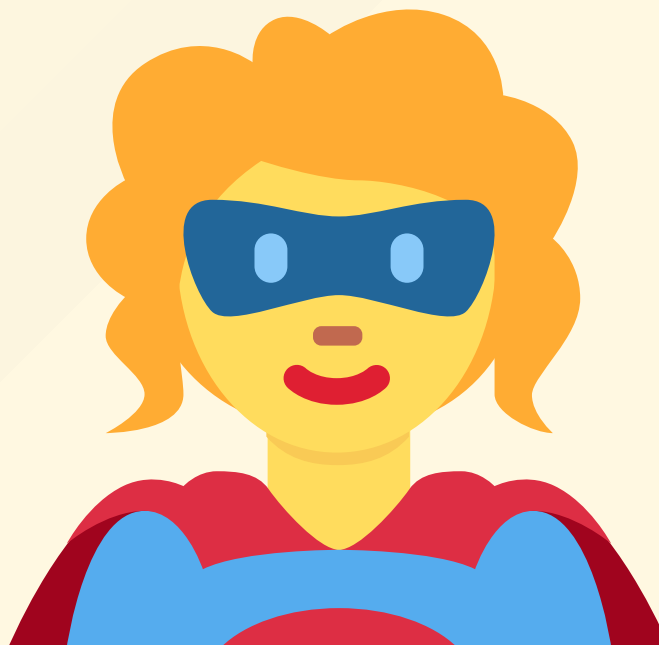




Kubernetes



"duh, we're doing Kubernetes"





Kubernetes: Nodes (naming)

```
$ kubectl get nodes
```

NAME	STATUS	ROLES	AGE	VERSION
ip-10-170-7-102.eu-west-2.compute.internal	Ready	<none>	24h	v1.21.5-eks-9017834
ip-10-170-7-99.eu-west-2.compute.internal	Ready	<none>	24h	v1.21.5-eks-9017834





Kubernetes: Pods (naming)

```
$ kubectl get pods -A
```

NAMESPACE	NAME	READY	STATUS	RESTARTS	AGE
cert-manager	cert-manager-6d99c7965c-c9q92	1/1	Running	0	24h
cert-manager	cert-manager-cainjector-748dc889c5-ljv8c	1/1	Running	0	24h
cert-manager	cert-manager-webhook-5b679f47d6-wnt2f	1/1	Running	0	24h
kube-system	aws-node-7b7q4	1/1	Running	0	24h
kube-system	aws-node-vwr5m	1/1	Running	0	24h
kube-system	calico-node-jfndm	1/1	Running	0	24h
kube-system	calico-node-zhssf	1/1	Running	0	24h
kube-system	calico-typha-7dd5d4b984-p52gx	1/1	Running	0	24h
kube-system	calico-typha-horizontal-autoscaler-767b5c958c-w6pjt	1/1	Running	0	24h
kube-system	cluster-autoscaler-6c8dc687c6-pts7q	1/1	Running	1	24h
kube-system	coredns-65ccb76b7c-8pqj6	1/1	Running	0	24h
kube-system	coredns-65ccb76b7c-dd48d	1/1	Running	0	24h
kube-system	kube-proxy-5vqz2	1/1	Running	0	24h
kube-system	kube-proxy-zlh5k	1/1	Running	0	24h
kube-system	metrics-server-977777f66-mvr56	1/1	Running	0	24h
nginx-ingress	ingress-controller-5b47bdfd66-c2xj8	1/1	Running	0	24h
nginx-ingress	ingress-controller-5b47bdfd66-g94xw	1/1	Running	0	24h
external-dns	external-dns-689dc89999-s6mjz	1/1	Running	0	24h





Kubernetes: Pods (checks)

```
livenessProbe:  
  httpGet:  
    path: /healthz  
    port: http
```





Don't look

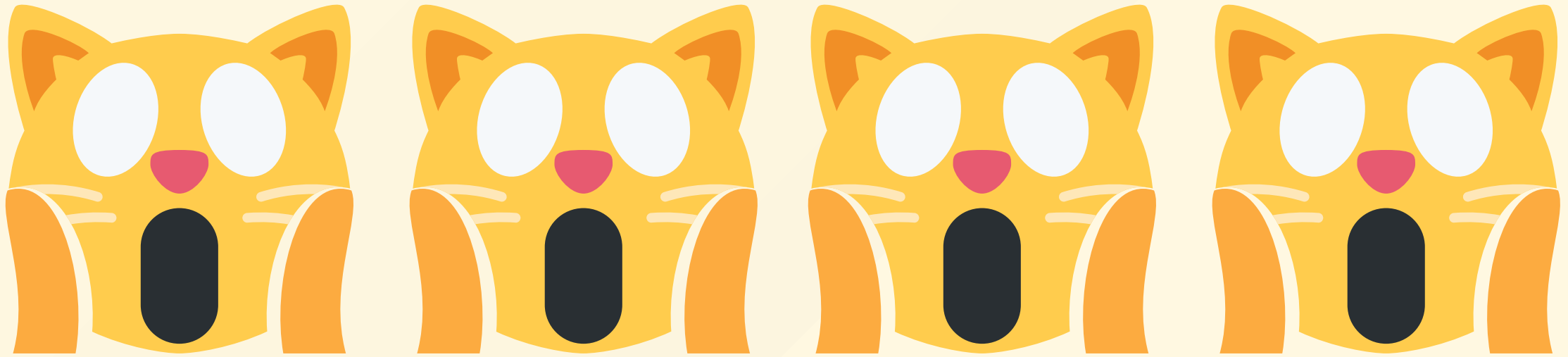


```
eksctl create cluster \  
  --name my-cluster \  
  --version 1.21 \  
  --without-nodegroup
```

Now what?











```
helm install cert-manager jetstack/cert-manager  
helm install external-dns external-dns/external-dns  
helm install nginx-ingress nginx-stable/nginx-ingress  
helm install istiod istio/istiod  
etc
```



So?






Well

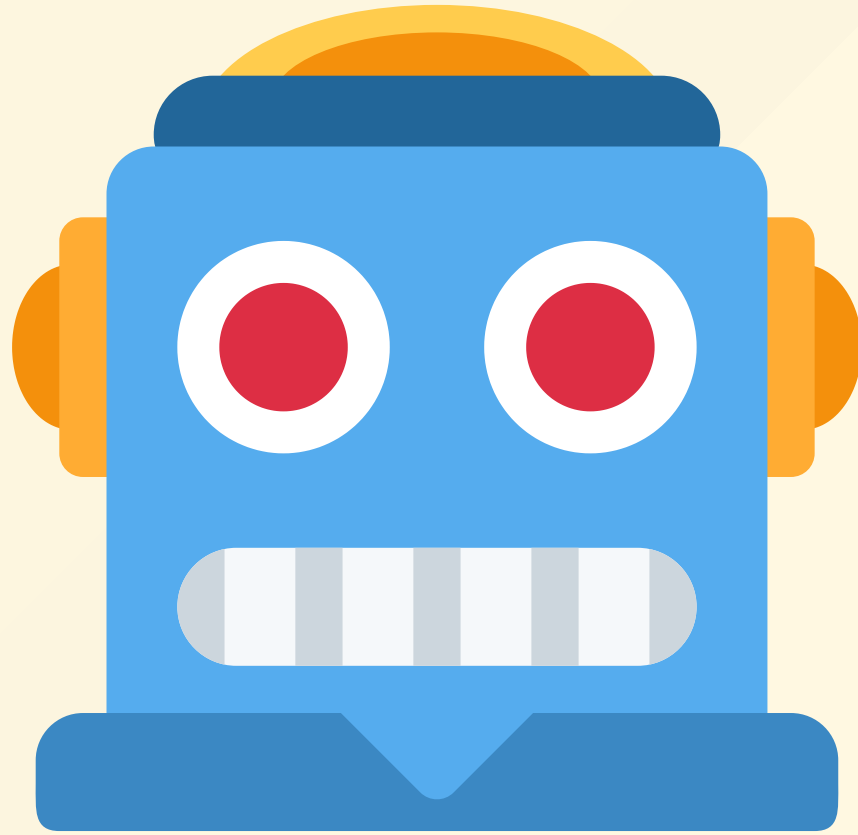
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Well

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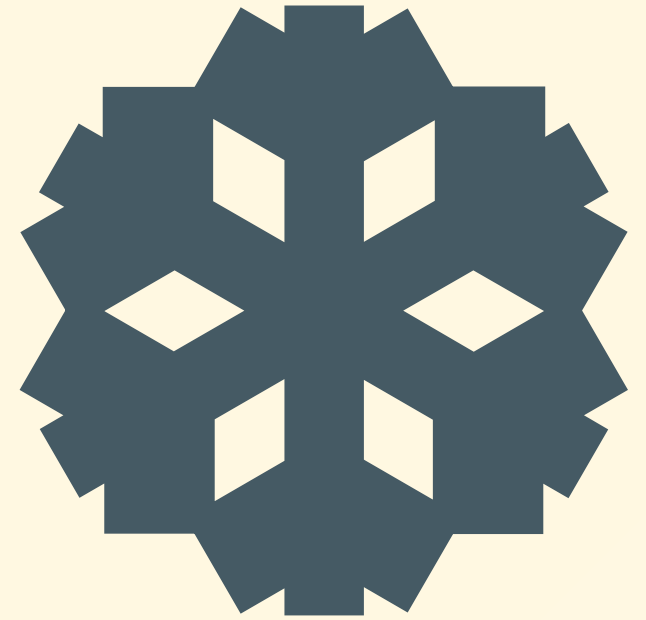


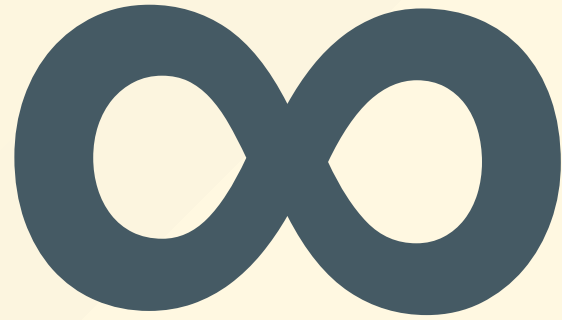


Day 2

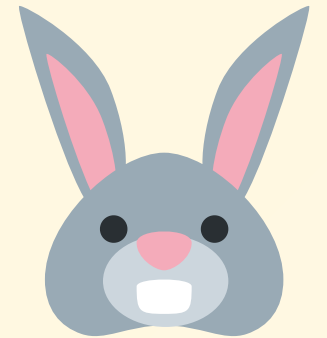
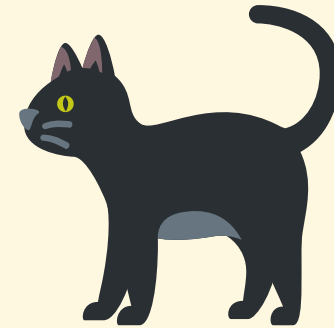
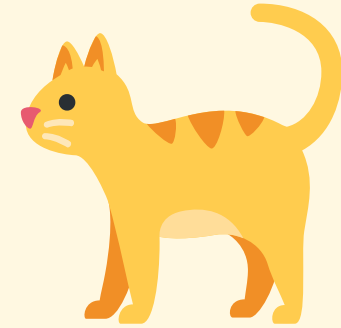
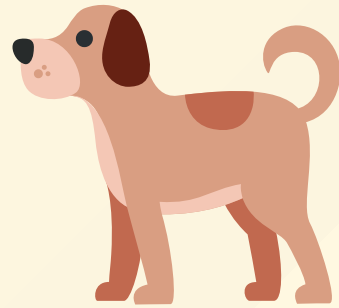


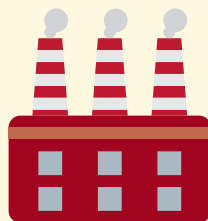
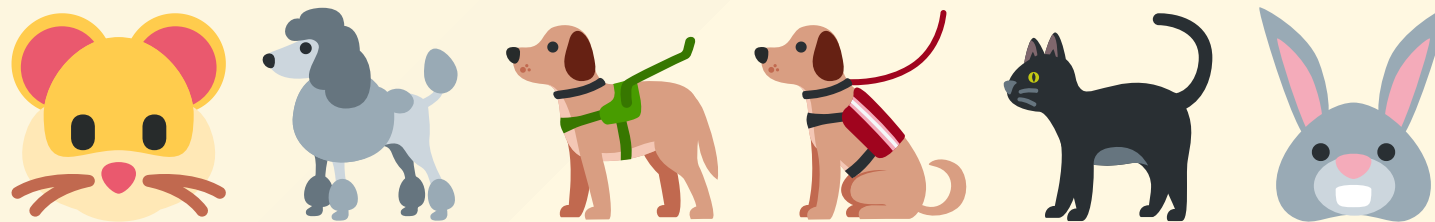
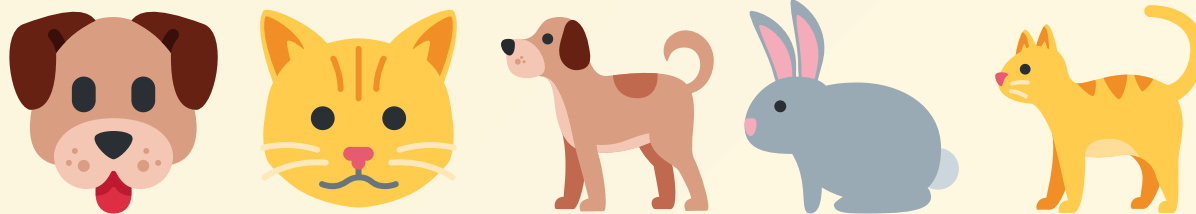
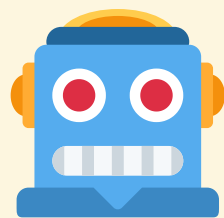






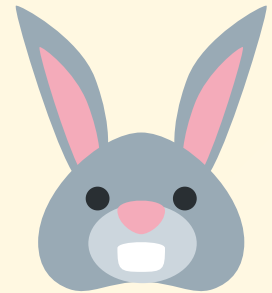
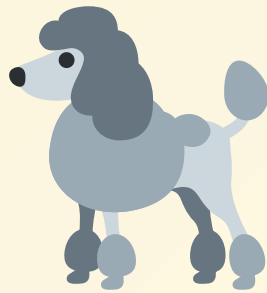
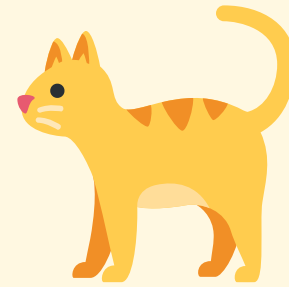
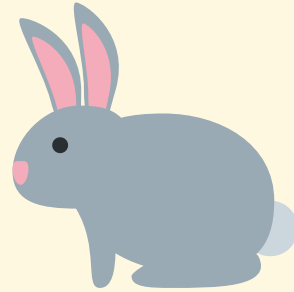
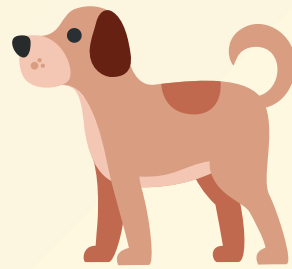








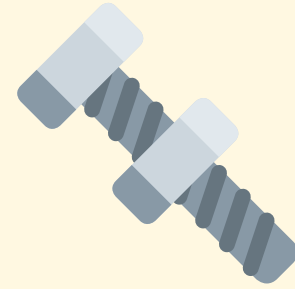
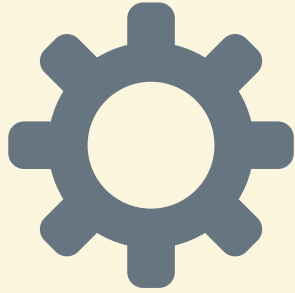
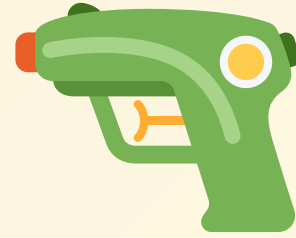
I ❤️















**OXI
CLEAN**

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www.my.tupperware.ca/leonalevins

WANTED: Someone to go back in time with me. This is not a joke. P.O.Box 1004-1557-4th Avenue, Prince George, BC, V2L 3K1. You'll get paid after we get back. Must bring your own weapons. Safety not guaranteed. I have only done this once before.

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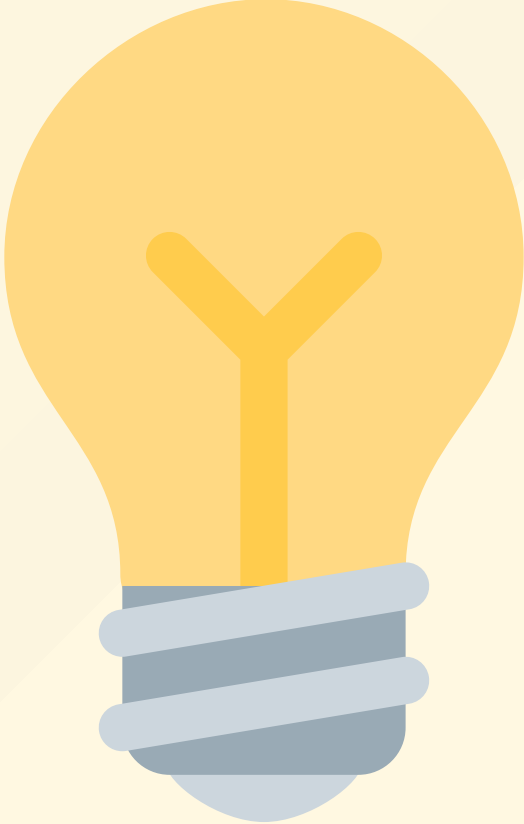
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Application Definition & Development

<p>Languages & Frameworks</p>	<p>Data</p>	<p>Source Code Management</p>	<p>Application Definition</p>	<p>Registry Services</p>	<p>CI / CD</p>	<p>3rd Party APIs</p>
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Orchestration & Management

<p>Scheduling & Orchestration</p>	<p>Coordination & Service Discovery</p>	<p>Service Management</p>
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Runtime

<p>Cloud-Native Storage</p>	<p>Container Runtime</p>	<p>Cloud-Native Network</p>
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Provisioning

<p>Infrastructure Automation</p>	<p>Host Management / Tooling</p>	<p>Secure Images</p>
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Infrastructure

Platforms

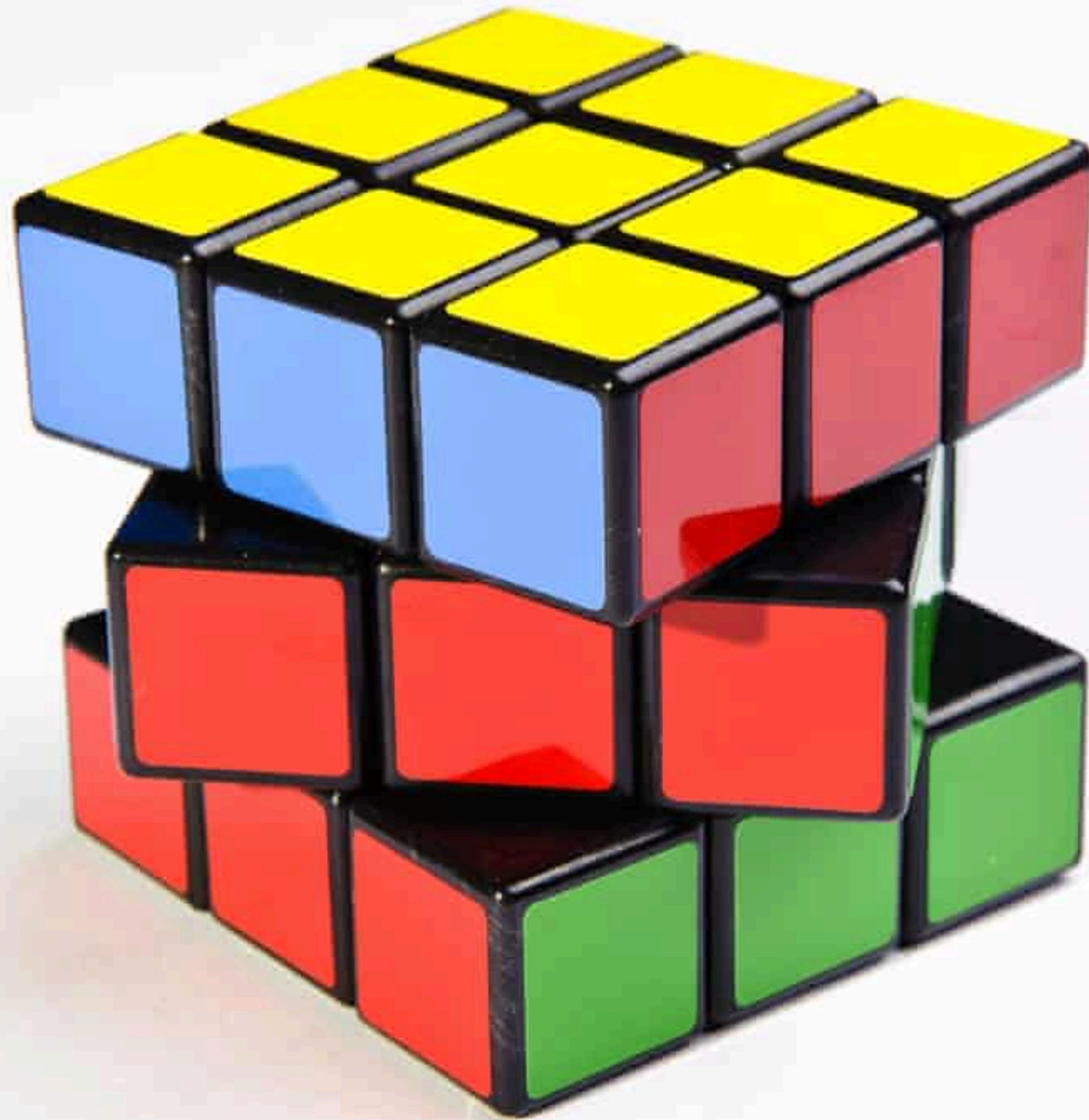
Observability & Analysis

Monitoring

Logging

Tracing







App Definition and Development

This section displays a wide array of tools for defining and developing applications. It includes databases like KV and Vitess, messaging tools like Apache Camel and RabbitMQ, and application definition tools like Helm and Kubernetes. The grid is organized into sub-categories such as Database, Streaming & Messaging, Application Definition & Image Build, and Continuous Integration & Delivery.

Orchestration & Management

This section features tools for orchestrating and managing infrastructure. It includes schedulers like Kubernetes, and orchestration tools like Argo and Flux. It also covers coordination and service discovery (CoreDNS, etcd), remote procedure call (gRPC), service proxies (Envoy), API gateways (Kong, Istio), and service meshes (Istio, Linkerd).

Runtime

This section lists tools used during the runtime of an application. It includes cloud native storage (Rook, Longhorn), container runtimes (CRI-O, CNI), and cloud native networks (Flannel, Cilium). The tools are categorized into Cloud Native Storage, Container Runtime, and Cloud Native Network.

Provisioning

This section contains tools for provisioning infrastructure. It includes automation and configuration tools like Ansible and Puppet, container registries like Harbor, and security and compliance tools like Falco. Other categories shown are Automation & Configuration, Container Registry, Security & Compliance, and Key Management.

Special

This section is a large grid of various tools and services. It includes Kubernetes Certified Service Providers and Kubernetes Training Partners. It covers a wide range of industries and specialized use cases, such as CI/CD, observability, and security. The tools are organized into two main columns under the heading 'Special'.

Platform

This section focuses on platform-related tools. It includes Certified Kubernetes Distribution (CNCF Graduate, Incubating, or Sandbox) and Hosted (AWS, Azure, GCP). It also covers Certified Kubernetes Installer (AWS, CRANE) and PaaS/Container Service (Heroku, AWS Fargate). The categories are Certified Kubernetes - Distribution, Certified Kubernetes - Hosted, Certified Kubernetes - Installer, and PaaS/Container Service.

Observability and Analysis

This section lists tools for monitoring and analyzing system performance. It includes monitoring tools like Prometheus, Grafana, and Thanos, logging tools like ELK Stack and FluentD, tracing tools like Jaeger, and chaos engineering tools like Chaos Mesh and Litmus. The categories are Monitoring, Logging, Tracing, and Chaos Engineering.

Serverless

This block shows a screenshot of the CNCF Serverless Landscape interactive display. It provides an overview of serverless architectures and lists various providers and services available in the ecosystem.

Members

This block displays a screenshot of the CNCF Members display, which lists all the organizations and individuals that are members of the Cloud Native Computing Foundation.

CD Foundation Landscape

This block shows a screenshot of the CD Foundation Landscape, which maps out the different toolsets and approaches used for continuous deployment across various platforms.

CLOUD NATIVE Landscape

This block features the CLOUD NATIVE Landscape logo and a QR code that links to the main landscape page. It also includes the text: 'This landscape is intended as a map through the previously uncharted terrain of cloud native technologies. There are many routes to deploying a cloud native application, with CNCF Projects representing a particularly well-traveled path.'









