# Once Upon a Time...

#### Alerts don't suck. YOUR alerts suck!



@LeonAdato Principal Technical Evangelist



#### Leon Adato

- Principal Technical Evangelist
  - o at Kentik
- ~35 yrs in tech.
- ~25 yrs monitoring & observability.
- ~10 yrs as a Tech Evangelist, DevRel Advocate, and (ugh) "Head Geek".
- Tivoli, BMC, OpenView, janky perl scripts, Nagios, SolarWinds, DOS batch files, Zabbix, Grafana, New Relic, and other assorted nightmare fuel.

#### @LeonAdato on social media.

#### This is an Oyster Talk™



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#### The Good Book Says....



#### Inbox rules are like a\$\$holes...\*

Edit rule: Received from Monitoring Alerts		
*Required fields		
Apply this rule		
* When the message arrives, and:		
It was received from	Monitoring Alerts	
Do the following:		
Delete the message	•	
More Options		
More Options		

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ne has one, and they all stink

## A hill I will die on





## **Three Important Rules:**

Alerts <> Monitoring
Alerts != Monitoring
Alerts ≠ Monitoring

#### About once a year...

My boss went to

...and all I got was this new observability solution

#### The problem with high CPU alerts isn't the CPU



## Hold up...



## Lesson Two: Monitoring vs Observability

#### Lesson Two: Monitoring vs Observability Monitoring AND Observability

## Let's add a little nuance

### Observability

- Un-Known Unknowns
- High cardinality
- Correlation baked-in
- Golden signals

## Monitoring

- Known Unknowns
- All cardinalities welcome
- (mostly) manual correlation
- Domain-specific signals

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## **Alerts and Observability**

#### Observability

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## Lesson Three: Alerts Must Matter

#### A simple algorithm:

#### IFF(Human && do something && now && about \$problem) == true

IFF( Human && do something && now && about \$problem ) == true

## If it's not an alert,

- (!= human)
- (!= now)
- (!= problem)
- (!= doing something)

== automation

== report

What is it?

- == dashboard
- == <u>Delete. It.</u>

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#### The problem with high CPU alerts isn't the CPU



#### Do you see it?



Credit: Leon Fayer

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#### Do you see it?



Credit: Leon Fayer

@LeonAdato

#### Do you see it?



Credit: Leon Fayer

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#### Monitoring is like Music: Both need a solid baseline!



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### Yes, it's a problem

Your disk is almost full Save space by optimizing storage. Close Manage...

## But what do you DO about it?

#### What we have here is... ...a failure to AUTOMATE



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#### **Why Do Network Engineers Drink?**





#### (automated) Insight

- Time to first byte vs three way handshake
- CPU/RAM on the device(s)
- ingress/egress interface info
- Path information
- Latency, packet loss, jitter
- MTU configuration
- Duplex configuration
- TAC information

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What we have here is... ...a failure to AUTOMATE

When (this thing) goes wrong, What do YOU do about it?



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## Lesson Four: Skilled Interrogati... Interviewing



#### Hunting the great "useful alert"

- How do YOU know when something went wrong?
- How do you know it's "all better"?
- Is there a knowledge article for it (yet)?
- Can you make it happen on purpose?

#### Let's sum up:

- Identified and interrogated the recipient
- Designed alert that matters because it
  - Has real-world trigger elements
  - Takes duration and baseline into account
  - Includes automation
- Verified the alert is built with the intent of

immediate action by a human

## Lesson Five: The work never ends

#### **Ancient Wisdom**

## *"It is not your duty to finish the work, but neither are you at liberty to neglect it."* - Ethics of our Fathers 2:16

#### Are you TRRMANEL?

# I'm <u>ready</u> for your questions!

