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Pipeline Regulatory Compliance with Maximo
DOT/PHMSA 49 CFR 192

December 8, 2017

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Presenting today

- Russ Anderton – today's host and Vice President, Oil & Gas

- Jeff O'Donnell - Practice Lead for Oil and Gas

- Shawn Nelson - Senior Business Process Consultant

- Aaron Bowman – GIS Lead

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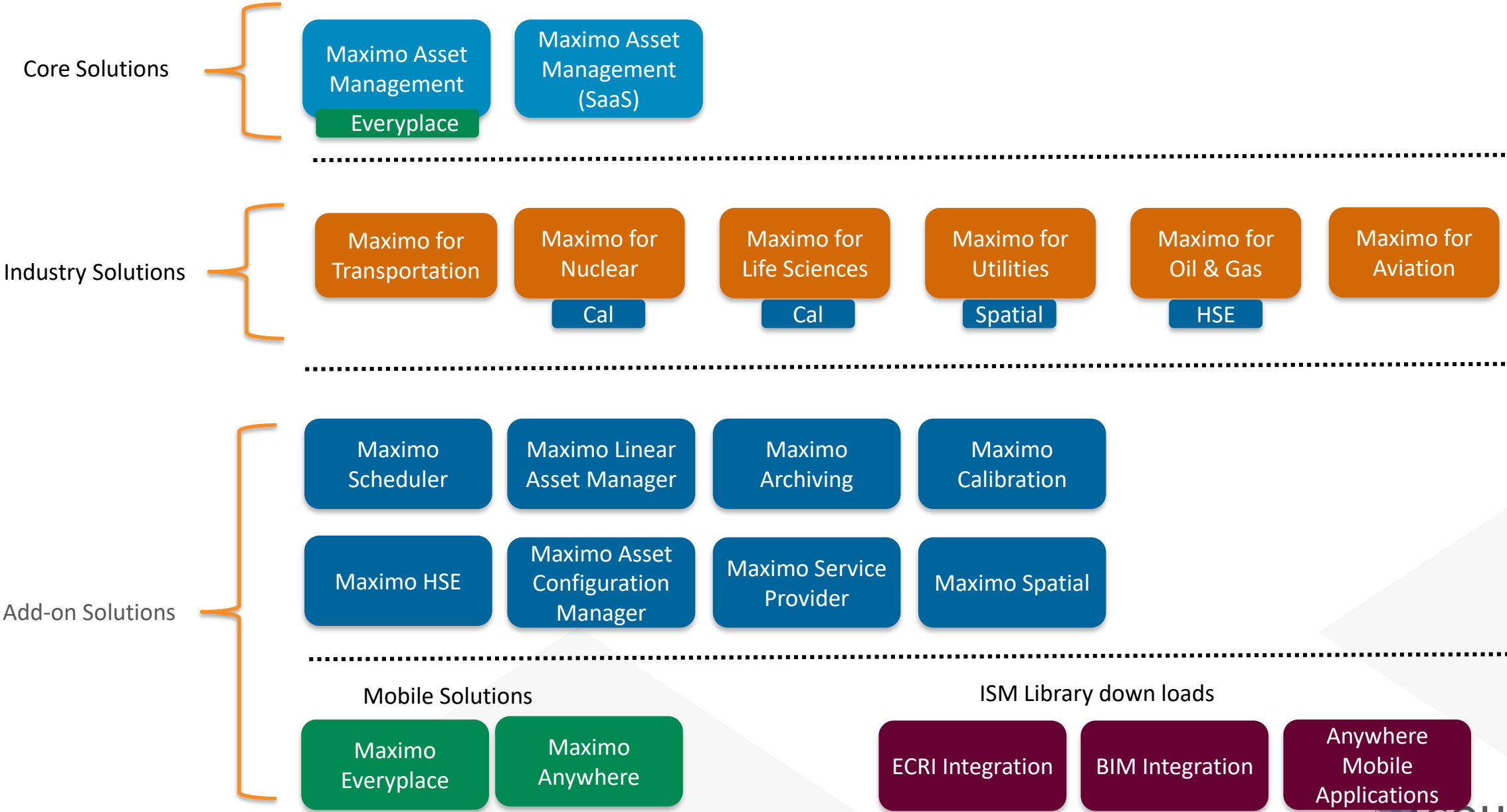
Today's Agenda

- Introduction (Russ)
- Discussion of the Regulations for Today's Presentation (Jeff)
- Regulatory Compliance Application (Shawn)
- GIS / Spatial Interface Discussion and Demo (Aaron)
- Setting Up Maximo 7.6.1 Oil & Gas for Regulatory Compliance Work (Shawn)

IBM's Maximo Product Suite



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Products Used for Today's Presentation

Core Solutions

Maximo Asset Management

Everyplace

V7.6.0.8

Industry Solutions

Maximo for Oil & Gas

HSE

V7.6.1

Add-on Solutions

Maximo Spatial

V7.6.0.2

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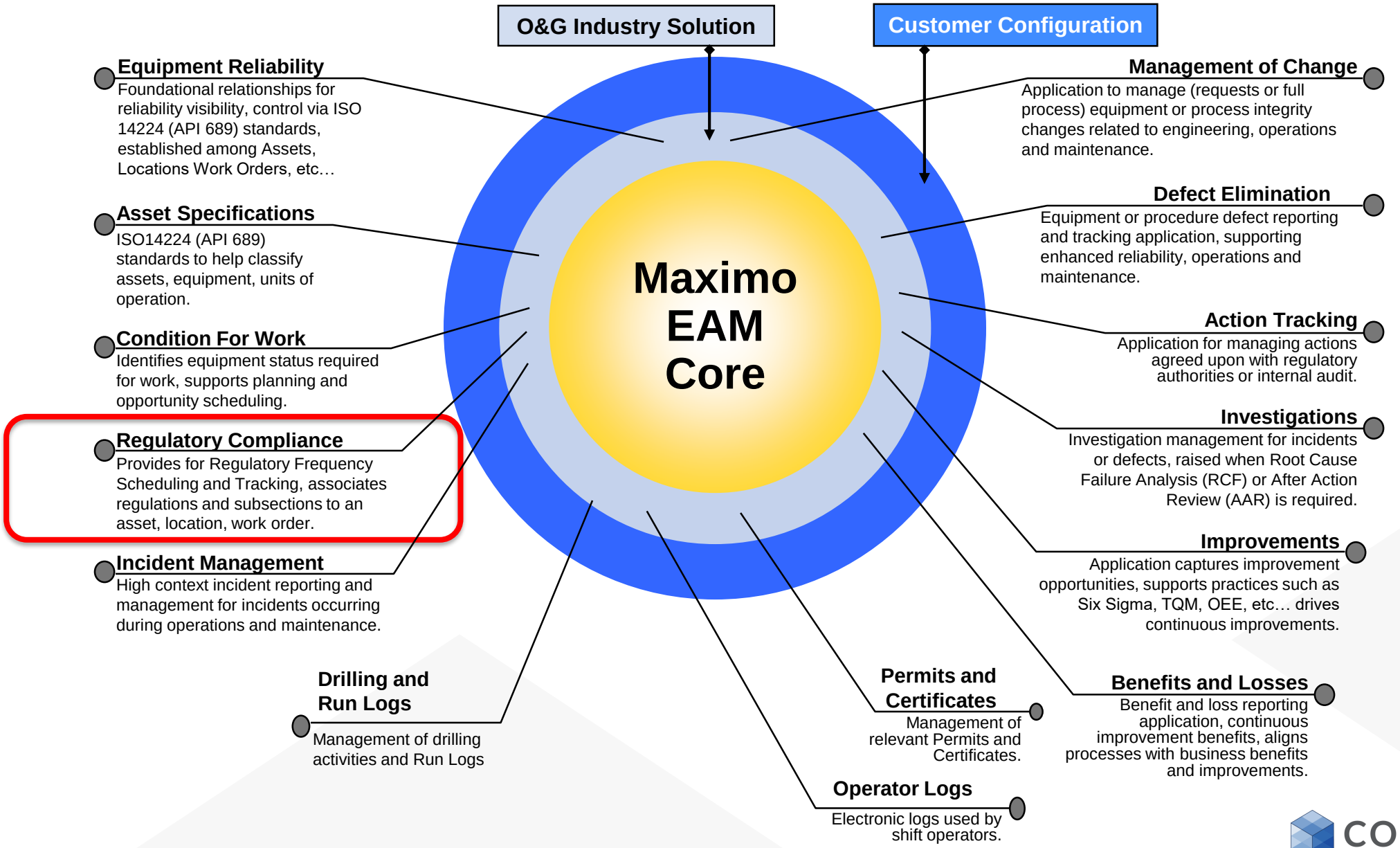
Maximo Oil & Gas/HSE Industry Solution



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Today’s Focus - DOT/PHMSA 49 CFR 192

Why is compliance with PHMSA regulations more important than ever?

- Greater scrutiny into a pipeline company's compliance and safety records. Often Media driven
- Increased regulation as a result of serious pipeline incidents. Integrity Management Program requirements and Documentation.
- Increased PHMSA inspections including operator management systems. 1,175 inspections of pipeline companies initiated in 2016
- Up to $50K and 5 yrs. imprisonment for a corrective action order

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Today's Discussion

- Today we will discuss how Maximo O&G/HSE supports compliance with three (3) specific regulations:
  - CFR 49 192.807 for Record Keeping – (documenting only qualified persons perform pipeline tasks)
  - CFR 49 192.609 for Class Location change studies
  - CFR 49 192.706 for Annual Leak Surveys
- While we use only these three examples, the concepts illustrated are transferable to other regulations

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Maximo - Regulatory Compliance Overview Demonstration

- The Regulatory Compliance Application allows an operator to define regulations and reference them on certain Maximo Objects, such as Job Plans, PMs and Work Orders
- The application lives in the Planning Module
- We've set up some regulations in Maximo to illustrate.

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DOT/PHMSA 49 CFR 192.805 & 192.807 Qualification Program and Recordkeeping

- Maximo can help with recordkeeping, qualifications, and compliance with CFR regulations that cover your written qualification program.
- Maximo tracks qualifications of individuals and helps prevent incorrect assignment.
- Crafts and Qualifications are associated to a Labor record in Maximo.
- Let’s have a look in Maximo at these relationships.

DOT/PHMSA
Leveraging GIS / Spatial for Compliance

- Maximo Spatial can be configured to interface with GIS. Maximo can pick up changes and notify personnel of the changes for compliance or other purposes.

- In today's example, we will show how Maximo can pull the changes in GIS Feature information from GIS through an automatic update (in today's demo via a cron task) updating the map information and notifying appropriate personnel of a Class Location change from Class 1 to Class 3.

- This notification would cause the appropriate personnel to follow your business process for creating a work order to perform a Change in Class Location study and stay in compliance with 49 CFR 192.609 .

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DOT/PHMSA 49 CFR-192.609
Class Location Change Study

- This regulation requires the pipeline operator to perform an immediate study under certain conditions when an increase in a Class Location is warranted.
- Class Location Changes are generally unplanned by the operator.
- The user can create Work Orders simply and effectively in Maximo for these studies using a Job Plan.

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DOT/PHMSA 49 CFR 192.706 Leak Surveys

- This regulation specifies the requirements for leak survey intervals based on Class Location 1-4.

- We'll discuss:

  - Using Maximo to automatically generate work orders utilizing PMs and PM Masters to help assure frequency of leak surveys to meet regulatory requirements.

  - Incorporating use of the Start Center for notifications and tracking.

  - How you might use the Core Maximo solution, or tailor a solution to your requirements.

  - In Core Maximo, let's look at an example of a PM designed to keep the work order Finish No Later Than date within the 15 month and calendar year requirement.

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Calculating and Managing Compliance Date (With Configuration)

Define Compliance Rule and Utilize Automation Script to Calculate Compliance Date

- Configure field for compliance rule on the PM record
- Automation script will reference compliance rule and adjust Compliance Date based on last performance. (FNL Constraint date)
- Automation script also tests for calendar year requirements and adjusts compliance date into current year if needed.
- Automation script will update compliance date of next work order performance in backlog based on same rules.

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Work Order Generation Information

Use Last Work Order's Start Date to Calculate Next Due Date?

Generate Work Order Based on Meter Readings (Do Not Estimate)?

Compliance Requirement:

DOT-1Y-15M | 1 Time per Calendare Yr - Not to exceed 15 M

Generate Work Order When Meter Frequency is Reached?

Time Based Frequency | Meter Based Frequency

Frequency:	Alert Lead (Days):	Extended Date:	Target Start
364	0		7:00 AM

Frequency Units:	Estimated Next Due Date:	Adjust Next Due Date?
DAYS		

Select Value

Filter > 1 - 9 of 9

Value	Description
DOT-1Y-15M	1 Time per Calendare Yr - Not to exceed 15 M
DOT-26xY-3W	26 Time per Calendar Yr - Not to exceed 3W
DOT-2xY-7.5M	2 Times per Calendare Yr - Not to exceed 7 1/2 M
DOT-3Y-39M	1 Time per 3 Calendare Yrs - Not to exceed 39 M DOT
DOT-4xY-4.5M	4 Times per Calendar Yr - Not to exceed 4 1/2 M
DOT-5Y	Not to Exceed 5 Years
DOT-5Y-63M	1 Time per 5 Calendar Yrs - Not to exceed 63 M
DOT-5Y-68M	1 Time per 5 Actual Yrs - Not to exceed 68 M
DOT-6xY-2.5M	6 Times per Calendar Yr - Not to exceed 2 1/2M

Cancel

Questions?

Save these links for future reference.

Cohesive Recorded webinars: http://www.cohesivesolutions.com/resources-and-news/webinars/
PHMSA site: https://www.phmsa.dot.gov/
Code of Federal Regulation site: eCFR — Code of Federal Regulations

Contact information if you need any assistance with upcoming projects.

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Thank you for your attendance!

Please have a safe and productive day