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NEEDS FOR SUBSEA CONTROL SUBSYSTEM COMPONENTS

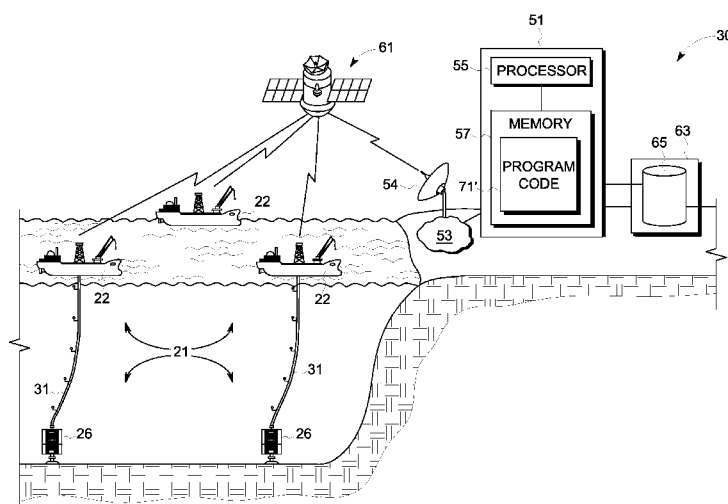


FIG. 1

(57) Abstract: Systems and methods to visualize component health and preventive maintenance needs for subsea control subsystem components are provided. Embodiments can include energizing one or more solenoids (64), detecting a solenoid firing event, detecting activity in blowout preventer components downchain from the solenoids, and incrementing a cycle count for the one or more solenoids and each downchain blowout preventer component activated. Embodiments can include projecting a replacement date for the solenoid or any of the downchain blowout preventer components based on the cycle count and user-defined thresholds. In embodiments, a user is provided with an interactive graphical representation of a blowout preventer (26) including selectable blowout preventer components thereby to visualize component health and preventive maintenance needs.



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C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	US 2012/197527 A1 (MCKAY JAMES EDWIN [US] ET AL) 2 August 2012 (2012-08-02)	1, 14
Y	abstract figures 1-8 paragraph [0019] - paragraph [0020] paragraph [0023] - paragraph [0024] paragraph [0026] - paragraph [0027] paragraph [0029] - paragraph [0030] paragraph [0035] paragraph [0038] - paragraph [0040] paragraph [0043] paragraph [0047] paragraph [0060] - paragraph [0064] paragraph [0066] - paragraph [0068] paragraph [0034] ----- -/-	2-13, 15-20



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C(Continuation). DOCUMENTS CONSIDERED TO BE RELEVANT		
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A	abstract paragraph [0012] paragraph [0015] - paragraph [0016] paragraph [0023] paragraph [0029] - paragraph [0030] paragraph [0030] paragraph [0034] - paragraph [0037] paragraph [0040] paragraph [0043] - paragraph [0044] -----	2-13, 15-20
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INTERNATIONAL SEARCH REPORT

Information on patent family members

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