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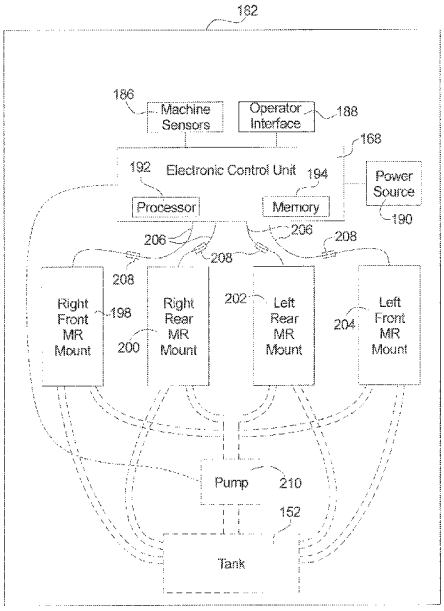
[Continued on next page]

(54) **Title**: MACHINE EMPLOYING CAB MOUNTS AND METHOD FOR CONTROLLING CAB MOUNTS BASED ON MACHINE LOCATION

(57) **Abstract**: A machine (100) employing controllable mounts (106) and a method for controlling such mounts (106) based on machine location are disclosed. The controllable mount (106) may include a housing (108), a pin (120), rheological fluid (116) within the housing (108) and coils (131) provided proximate to the rheological fluid (116). As current is applied to the coils (131), the apparent viscosity of the rheological fluid (116) is increased, and in so doing so is the stiffness of the controllable mount (106). Depending on machine location, however, the operator may want differing levels of stiffness in one or more of the controllable mounts (106). For example, when roading on rocky terrain, the operator may want relatively loose mounts (106) so as to absorb the large vibration inputs and make for a more comfortable ride. The present disclosure therefore identifies the machine location through global positioning satellite information, topography maps, inclinometers, altimeters, operator input, and the like and controls the current to the coils, and thus the relative stiffness and damping of the controllable mounts, accordingly.

FIG. 4



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A. CLASSIFICATION OF SUBJECT MATTER

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According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

IPC : E02F 9/16, F16F 9/53, E02F 9/20, B66C 13/54, B66F 9/075

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Korean utility models and applications for utility models

Japanese utility models and applications for utility models

Electronic data base consulted during the international search (name of data base and, where practicable, search terms used)

eKOMPASS(KIPO internal) & Keywords: mount, viscosity, fluid, magnetic, coil, field and similar terms.

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X Y	JP 2006-275287 A (SHIN CATERPILLAR MITSUBISHI LTD.) 12 October 2006 See claims 1-3 and figures 1-4.	1,3-7 2,8-10
Y	JP 2002-322679 A (HITACHI CONSTR MACH CO., LTD.) 08 November 2002 See claims 1-2 and figures 1, 7.	2,8-10
A	JP 63-210432 A (TOYOTA MOTOR CORP.) 01 September 1988 See claim 1 and figures 1-2.	1-10
A	JP 2003-335164 A (TOYO TIRE & RUBBER CO., LTD.) 25 November 2003 See claims 1-6 and figure 1.	1-10

☐ Further documents are listed in the continuation of Box C.

☒ See patent family annex.

* Special categories of cited documents:

"A" document defining the general state of the art which is not considered to be of particular relevance

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"P" document published prior to the international filing date but later than the priority date claimed

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"X" document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone

"Y" document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents,such combination being obvious to a person skilled in the art

"&" document member of the same patent family

Date of the actual completion of the international search	Date of mailing of the international search report
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Information on patent family members

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