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(71) Applicants: **PIETRO FIORENTINI SPA** [IT/IT]; E. Fermi 8/10, 36057 Arcugnano (IT). **PIETRO FIORENTINI (USA), INC** [US/US]; Peninsula Street, 131B, Wheeling, West Virginia 26003 (US).

(72) Inventors: **WAID, Margaret**; 3306 Amber Forest Drive, Houston, Texas 77068 (US). **HASHEM, Mohamed**; 5507 Silverpark, Houston, Texas 77041 (US). **NARDI, Paolo**; via Cavalieri del Santo Sepolcro 6, 20121 Milano (IT). **YU-**

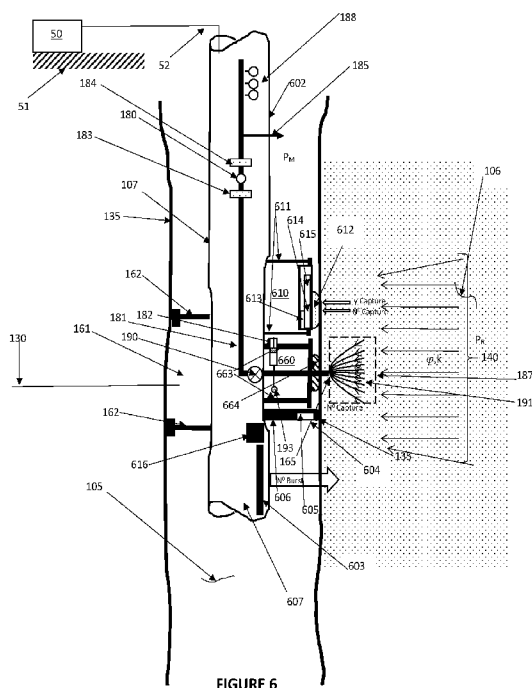
RATICH, Michael; 14 Old Priory Close, Hamble Hampshire SO31 4QP (GB).

(74) Agent: **PATTERSON, Matthew**; 15 Chapman Drive, Glastonbury, Connecticut 06033 (US).

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(54) Title: SYSTEMS AND METHODS FOR MONITORING CHANGES IN A FORMATION WHILE DYNAMICALLY FLOWING FLUIDS



(57) Abstract: Methods and systems for measuring neutron sigma of downhole reservoir as a function of time for a predetermined testing volume are disclosed. The methods and systems of the present invention analyze the testing volume while maintaining the formation in the testing volume in an unchanged and undamaged state and while dynamically flowing fluids in and out of the testing volume. The systems and methods of the present invention are especially important in determining petrophysical information about the reservoir as well as the in-situ effect of substances on enhanced oil recovery.

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