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(71) Applicant (for all designated States except US): **SINGAPORE TECHNOLOGIES KINETICS LTD** [SG/SG];  
249 Jalan Boon Lay, Singapore 619523 (SG).

(72) Inventor; and

(75) Inventor/Applicant (for US only): **ANG, Teoh, Hwa** [SG/SG]; 1, St Nicholas View, Singapore 567964 (SG).

(74) Agent: **NG, Kim, Tean**; Nanyang Law LLC, P.O. Box 1861, Robinson Road Post Office, Singapore 903711 (SG).

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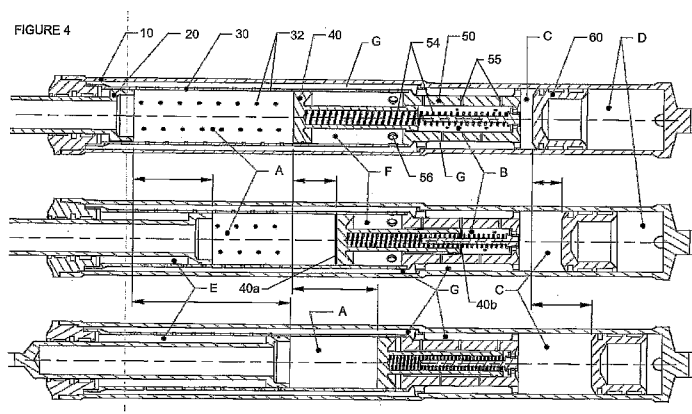
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(54) Title: CONSTANT DISPLACEMENT SHOCK ABSORBER



(57) Abstract: A shock absorber is disclosed for absorbing pressure from an impulsive or explosive force wherein a 2-stage hydraulic absorbing is provided. In the first or inner stage, a first piston (40) is provided telescopically mounted into a first cylinder (50) enclosing an inner reservoir (B), a return spring (54) coaxially mounted between the first piston (40) and first cylinder (50) urging the first piston (40) and first cylinder (50) apart from being telescopically compressed against each other; and at least a nozzle (55) provided through the first cylinder (50) wall enabling fluid communication between the inner reservoir (B) and an external fluid reservoir (G). The first piston (40) is predisposed to receive pressure acting thereupon by fluid translated from the shock to be absorbed. The second stage of hydraulic absorbing involves transmitting the pressure from the shock to the first piston (40). The first piston (40) is further predisposed to amplify the pressure acting thereupon to bear upon the inner reservoir (B) such that the amplified pressure on the fluid therein overcomes pressure of external fluid reservoir (G) and exit nozzle (55) at about choked flow rate.

