

Title (en)  
PRESSURE-REFERENCED PROGRAMMED FLOW CONTROL IN A HYDRAULIC VALVE

Publication  
**EP 0227296 A3 19890322 (EN)**

Application  
**EP 86308993 A 19861118**

Priority  
• US 79966585 A 19851118  
• US 79976585 A 19851118  
• US 85328486 A 19860417  
• US 85328686 A 19860417

Abstract (en)  
[origin: EP0227296A2] The point at which pump out pressure exceeds load is sensed to provide a point for scheduling flow to an actuator in a hydraulic system, such as an elevator. Flow is controlled by a stepper motor (28) that moves a flow control valve (27). When the pump (21) is turned on, the valve (27) is positioned to bypass flow; the bypass flow is then programmably decreased to increase the flow to the actuator. Reverse flow is regulated by the valve (27) to control actuator retraction. Reverse flow is initiated by opening a check valve (40) with an actuator (50) that opens it first to reduce pressure across the valve, then fully. The flow control valve (27) also operates to relieve excess pressure in the system.

IPC 1-7  
**B66B 1/04**; **F15B 21/08**

IPC 8 full level  
**B66B 1/04** (2006.01)

CPC (source: EP)  
**B66B 1/24** (2013.01)

Citation (search report)  
• [X] US 3977497 A 19760831 - MCMURRAY DAVID CLAUDE  
• [XP] WO 8606359 A1 19861106 - PENTTI RITA  
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Designated contracting state (EPC)  
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DOCDB simple family (publication)  
**EP 0227296 A2 19870701**; **EP 0227296 A3 19890322**; **EP 0227296 B1 19920311**; AU 604000 B2 19901206; AU 6518086 A 19870521; CN 1010970 B 19901226; CN 86107735 A 19870617; DE 3684262 D1 19920416; FI 864662 A0 19861117; FI 864662 A 19870519; FI 90036 B 19930915; FI 90036 C 19931227; NZ 218082 A 19881028

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**EP 86308993 A 19861118**; AU 6518086 A 19861114; CN 86107735 A 19861117; DE 3684262 T 19861118; FI 864662 A 19861117; NZ 21808286 A 19861028