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54 **Emergency control hydraulic system for a crane.**

57 A fluid control circuit wherein said fluid is preferably a hydraulic fluid or other similar fluid, as appropriate to the application, having a variety of emergency control safety features. The fluid control system is particularly adapted for use with lifting devices, especially cranes, for loading and unloading items to or from a moving platform. This system as described is typical of that which may be used on a crane having both a main hoist and an auxiliary or whip hoist both of which are used for independent and differing load applications. The control circuit is capable of automatically setting all of the load bearing brakes upon an electrical or/and hydraulic power failure. In addition, the control circuit provides a means for an operator to release the auxiliary or whip hoist, which is the smaller load bearing hoist, in an emergency situation where the line or hook on the auxiliary or whip hoist line becomes caught on a moving object.



DOCUMENTS CONSIDERED TO BE RELEVANT			
Category	Citation of document with indication, where appropriate, of relevant passages	Relevant to claim	CLASSIFICATION OF THE APPLICATION (Int. Cl. 3)
X, P	US-A-4 398 698 (FMC) * Whole document *	1, 12-14	B 66 C 23/90 B 66 D 1/44 B 66 D 5/26
A	---	2-6	
X	US-A-4 188 790 (A/S BERGENS MEKANISKE VERKSTEDER) * Whole document *	1	
A	---	2-6, 12-14	
A	US-A-4 187 681 (BUCYRUS-ERIE) * Whole document *	1-6, 12-14	
A	DE-A-2 146 586 (G.L. REXROTH GmbH) * Whole document *	1-6, 12-14	
A	US-A-3 180 090 (WESTERN GEAR) * Whole document *	1-6, 12-14	B 66 C B 66 D F 16 H
A	GB-A-1 352 028 (CLARKE CHAPMAN)		
A	US-A-4 043 125 (P. KUBIK)		
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The present search report has been drawn up for all claims			
Place of search THE HAGUE		Date of completion of the search 30-08-1985	Examiner LINTZ C.H.
CATEGORY OF CITED DOCUMENTS		T : theory or principle underlying the invention E : earlier patent document, but published on, or after the filing date D : document cited in the application L : document cited for other reasons & : member of the same patent family, corresponding document	
X : particularly relevant if taken alone Y : particularly relevant if combined with another document of the same category A : technological background O : non-written disclosure P : intermediate document			



DOCUMENTS CONSIDERED TO BE RELEVANT			
Category	Citation of document with indication, where appropriate, of relevant passages	Relevant to claim	CLASSIFICATION OF THE APPLICATION (Int. Cl. ³)
A	US-A-3 943 713 (EATON)		

A	FR-A-2 075 089 (LINDE)		

			TECHNICAL FIELDS SEARCHED (Int. Cl. ³)
The present search report has been drawn up for all claims			
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