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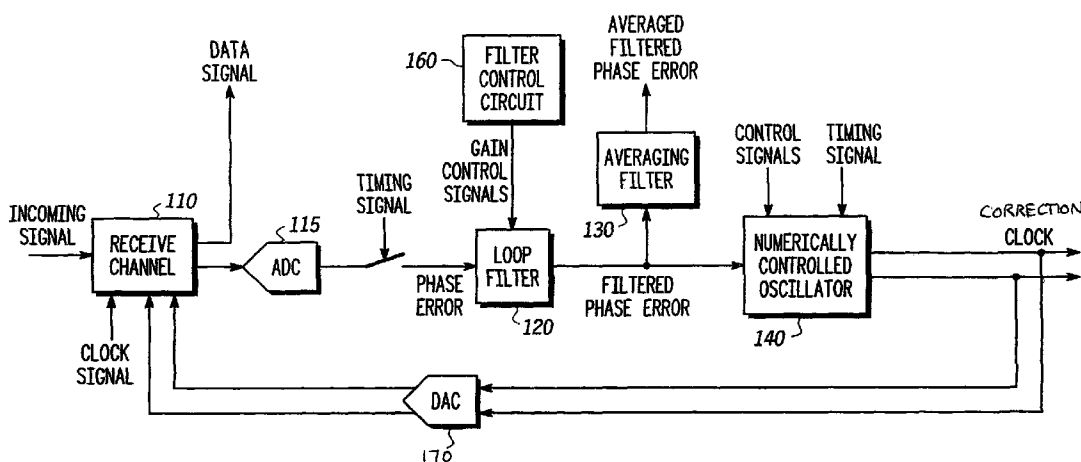
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(57) Abstract: A tracking circuit (100) is provided for controlling a locally-generated clock. A receive channel (110) in the tracking circuit receives an incoming signal and a local clock, generates a local signal based on the local clock, and compares the local signal and the incoming signal to generate a data signal and an unfiltered phase error signal. A loop filter (120) filters the unfiltered phase error signal to provide a filtered phase error signal. A numerically controlled oscillator (140) generates a correction clock based on the filtered phase error signal. And a filter control circuit (160) provides one or more filter control signals to control operational parameters of the loop filter. The correction clock is provided to the receive channel to modify at least one of the phase and frequency of the local clock. In addition, a sample switch (125) may also be provided to sample the unfiltered phase error signal.

WO 2006/071508 A3



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A. CLASSIFICATION OF SUBJECT MATTER
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USPC: 375/376
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B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)
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Electronic data base consulted during the international search (name of data base and, where practicable, search terms used)

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
Y	US 6965616 B1 (QUIGLEY et al) 6 October 2000 (6.10.00), figures 6A and 6D, column 17, lines 36-65, column 13, lines 26-67, column 23, lines 37-42.	1-4, 8, 9, 12-17, 19-22
Y	US 4215430 B1 (JOHNSON, JR et al) 29 July 1980 (29.7.1980), column 4, lines 21-29, column 6, lines 43-59, column 8, lines 12-21.	1-4, 8, 9, 12-17, 19-22
Y	US 3918006 B1 (MUNNINGHOFF et al), 4 November 1975 (4.11.1975), column 5, lines 49-62.	2, 16
Y	US 5189664 (CHENG) 23 February 1993 (23.2.1993), figure 3, column 7; lines 19-29.	3, 4, 17
Y	US 5495512 A (KOVACS et al) 27 February 1996 (27.2.1996), figure 6, column 5, lines 30-44.	4
Y	US 5179348 A (THOMPSON) 12 January 1993 (12.1.1993), figure 1, column 3, lines 39-62.	8
Y	US 2003/0091122 A1 (HUMPHREYS et al) 15 May 2003 (15.5.2003), pages 2 and 3, paragraphs 0055 and 0058.	9, 21

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