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(71) Applicants:
- **MITSUBISHI HEAVY INDUSTRIES, LTD.**
  Tokyo 108-8215 (JP)
- **NABCO LIMITED**
  Kobe,
  Hyogo-ken 651-2271 (JP)

(72) Inventors:
- **Sonoda, Takashi**
  Takasago,
  Hyogo-ken 676-8686 (JP)
- **Matsuo, Minoru**
  Takasago,
  Hyogo-ken 676-8686 (JP)
- **Sugihara, Masahide**
  Kobe,
  Hyogo-ken 652-8585 (JP)
- **Edo, Koji**
  Kobe,
  Hyogo-ken 652-8585 (JP)
- **Maeda, Takayoshi**
  Kobe,
  Hyogo-ken 651-2413 (JP)
- **Kita, Yoshiyuki**
  Nishi-ku,
  Kobe,
  Hyogo-ken 651-2271 (JP)
- **Kobayashi, Yasunaga**
  Nishi-ku,
  Kobe,
  Hyogo-ken 651-2271 (JP)

(74) Representative: **Heusler, Wolfgang**
v. Bezold & Partner
Patentanwälte
Akademiestrasse 7
80799 München (DE)

(54) **Ship engine control system**

(57) A command signal is applied to a main unit (12) from a remote control unit (18) operated by an operator of a ship. A sensor unit (10) detects an operating state of a ship engine (2) and develops an operating state representative signal. The main unit (12) prepares and provides a main command based on the command signal and the operating state representative signal. A set including a subsidiary unit (14) and a valve (6) is provided for each of cylinders (4) of the engine (2). Each subsidiary unit (14) computes, from the operating state representative signal and the main command, operation timing, provides an operation timing command in accordance with the operation timing. The valve (6) is adapted to supply fuel to the associated cylinder (4) in accordance with the operation timing command. A subsidiary remote controller (20) is disposed at a location remote from the remote control unit (18), and is adapted to provide a first subsidiary command signal to the main unit (12) and a second subsidiary command signal to the subsidiary units (14). The main unit (12) is also capable of providing the main signal based on the first subsidiary command signal and the operating state representative signal. The subsidiary units (14) are also arranged to provide an operation timing command based on the second subsidiary command signal and the operating state representative signal.

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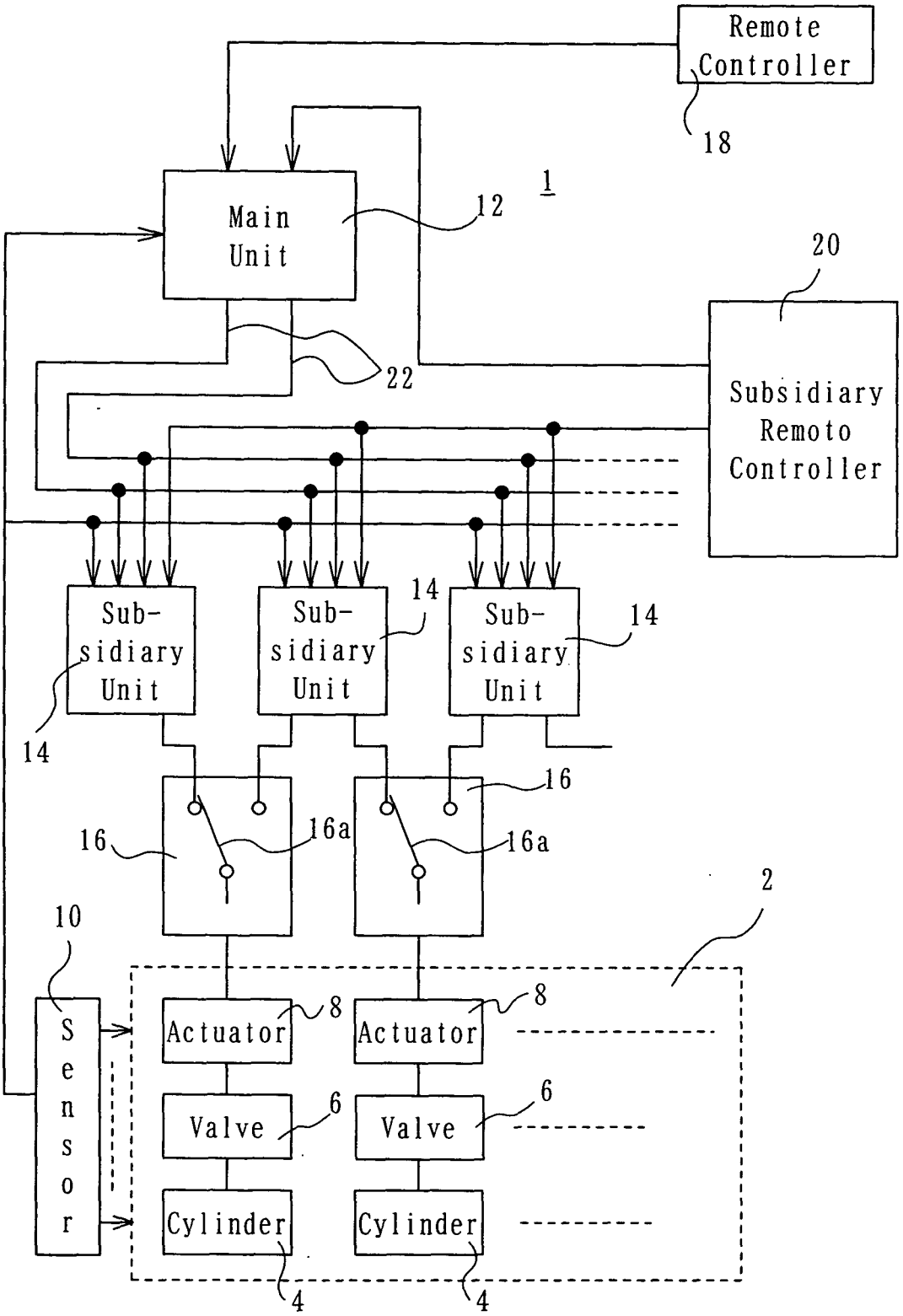
Remote Controller
18
1
Main Unit
12
20
22
Subsidiary Remoto Controller
Sub-sidiary Unit
14
Sub-sidiary Unit
14
Sub-sidiary Unit
14
14
16
16
16a
16a
2
10
Sensor
Actuator
8
Actuator
8
Valve
6
Valve
6
Cylinder
Cylinder
4
4

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EUROPEAN SEARCH REPORT

Application Number
EP 03 01 8468

DOCUMENTS CONSIDERED TO BE RELEVANT

Category	Citation of document with indication, where appropriate, of relevant passages	Relevant to claim	CLASSIFICATION OF THE APPLICATION (IPC)
A,D	US 5 515 748 A (YAGI MIKIYA [JP]) 14 May 1996 (1996-05-14) * claim 1 * * figures * -----	1	INV. B63H21/22 B63H21/14
A	US 5 741 166 A (NEWMAN JAMES O [US]) 21 April 1998 (1998-04-21) * column 1, line 5 - line 15 * * column 4, line 62 - column 5, line 57 * * column 13, line 27 - line 32 * * column 13, line 64 - column 14, line 3 * * figures * -----	1	

TECHNICAL FIELDS SEARCHED (IPC)

B63H

The present search report has been drawn up for all claims

Place of search	Date of completion of the search	Examiner
The Hague	23 April 2010	Gardel, Antony

CATEGORY OF CITED DOCUMENTS

X : particularly relevant if taken alone
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23-04-2010

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EPO FORM P0459

For more details about this annex : see Official Journal of the European Patent Office, No. 12/82