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(71) Applicant: **VESTAS WIND SYSTEMS A/S** [DK/DK]; Hedeager 44, DK-8200 Aarhus N (DK).

(72) Inventor: **GARCIA, Jorge Martinez**; Skejbyparken, Apartment 30, DK-8200 Aarhus N (DK).

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(54) Title: A METHOD FOR DAMPING DRIVE TRAIN OSCILLATIONS IN A WIND TURBINE GENERATOR

(57) Abstract: The present invention relates a wind turbine generator with an electrical generator, a dump load unit, for dissipating power, a wind turbine power controller and a damping controller both arranged to control wind turbine components based on a damping reference signal, the damping reference signal is a combined signal, and comprises a first reference signal and a second reference signal, the second reference signal is an oscillating part, the wind turbine power controller is controlling the power from the electrical generator according to the first reference signal and the damping controller is controlling the dump load unit to dissipate power according to the second reference signal. The invention also relates to a method for damping oscillations with wind turbine generators.

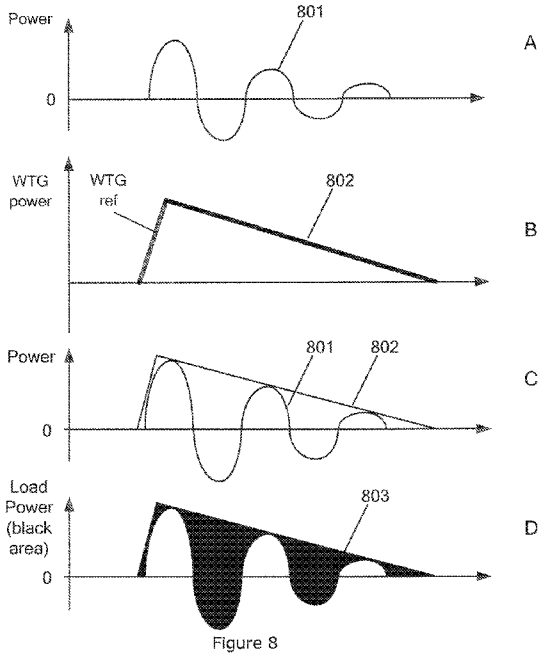

Figure 8

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A. CLASSIFICATION OF SUBJECT MATTER
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ADD.

According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)
H02J

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practicable, search terms used)
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C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	EP 1 780 860 A1 (GEN ELECTRIC [US]) 2 May 2007 (2007-05-02) abstract; figures 1-5 column 3, paragraph 13 - column 8, paragraph 32	1-17
X	EP 2 306 001 A2 (GEN ELECTRIC [US]) 6 April 2011 (2011-04-06) column 3, paragraph 11 - column 6, paragraph 21; figures 1-4	1-17
A	US 2011/222320 A1 (DELMERICO ROBERT WILLIAM [US] ET AL) 15 September 2011 (2011-09-15) page 2, paragraph 19 - page 3, paragraph 23; figure 2	1-17

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[X] Further documents are listed in the continuation of Box C.

[X] See patent family annex.

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Name and mailing address of the ISA/	Authorized officer
European Patent Office, P.B. 5818 Patentlaan 2 NL - 2280 HV Rijswijk Tel. (+31-70) 340-2040, Fax: (+31-70) 340-3016	Mäki-Mantila, Harri

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C(Continuation). DOCUMENTS CONSIDERED TO BE RELEVANT

Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
A	EP 1 819 023 A2 (GEN ELECTRIC [US]) 15 August 2007 (2007-08-15) column 2, paragraph 12 - column 3, paragraph 14; figure 2 -----	1-17

INTERNATIONAL SEARCH REPORT

Information on patent family members

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