Title (en)
METHOD FOR DETERMINING AN ORTHOGONALITY ERROR BETWEEN TWO SENSOR SIGNALS

Title (de)
VERFAHREN ZUM ERMITTELN EINES ORTHOGONALITÄTSFEHLERS ZWISCHEN ZWEI SENSORSIGNALEN

Title (fr)
PROCÉDÉ PERMETTANT DE DÉTERMINER UNE ERREUR D'ORTHOGONALITÉ ENTRE DEUX SIGNAUX DE DÉTECTION

Publication
EP 3180591 A1 20170621 (DE)

Application
EP 15749828 A 20150813

Priority
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Abstract (en)
[origin: WO2016024000A1] Method for determining an error (y) between two sensor signals (s1, s2) in an angle sensor which, on the basis of an angle transmitter, outputs the sensor signals (s1, s2) which have a periodic profile and are mathematically in an orthogonal relationship with one another, wherein a deviation from the orthogonal relationship between the sensor signals can occur on account of the error (y), having the steps of: - forming a radius signal (e_orth) using the sums of squares of the sensor signals, - determining the 2*nth harmonic of the radius signal (e_orth), where n is equal to a positive integer, and - determining the error of a value of the amplitude at the second harmonic, which value has been phase-shifted through 90° with respect to the rotation angle value.

IPC 8 full level
G01D 5/244 (2006.01)

CPC (source: CN EP KR US)
G01D 5/244 (2013.01 - KR); **G01D 5/24476** (2013.01 - EP KR US); **G01D 18/00** (2013.01 - CN)

Citation (search report)
See references of WO 2016024000A1

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DE 102015215511 A 20150813; CN 201580043317 A 20150813; EP 15749828 A 20150813; EP 2015068710 W 20150813; KR 20177003995 A 20150813; US 201715427508 A 20170208