Detección, estimación y problemas inversos con sistemas sonar [

2017

text (article)

Analítica

The present work introduces the reader to the basic theory used to optimally extract and process information in passive and active sonar systems. In particular, the typical problems addressed when implementing sonar technology systems are reviewed. The work also covers the basic statistical theory that is used in acoustic signal processing and the behavior of the receiving operating characteristics (ROC) when dealing with probability density functions for noise and signal in presence of noise with varying standard deviations. Finally, we review the underlying theory of inverse problems and model based matched field processing that will be implemented in a future visualization system for under water applications
The present work introduces the reader to the basic theory used to optimally extract and process information in passive and active sonar systems. In particular, the typical problems addressed when implementing sonar technology systems are reviewed. The work also covers the basic statistical theory that is used in acoustic signal processing and the behavior of the receiving operating characteristics (ROC) when dealing with probability density functions for noise and signal in presence of noise with varying standard deviations. Finally, we review the underlying theory of inverse problems and model based matched field processing that will be implemented in a future visualization system for under water applications

Título: Detección, estimación y problemas inversos con sistemas sonar electronic resource]

Editorial: 2017

Tipo Audiovisual: Ingeniería Sonar Inversión Estadística Procesamiento de Campo Ajustado Tomografía Acústica Oceánica Señales de audio Sonar Statistical Inversion Matched Field Processing Ocean Acoustic Tomography Audio signals

Documento fuente: Ingenium, ISSN 0124-7492, Vol. 18, Nº. 36, 2017 (Ejemplar dedicado a: INGENIUM), pags. 67-80

Nota general: application/pdf

Restricciones de acceso: Open access content. Open access content star

Lengua: Spanish

Enlace a fuente de información: Ingenium, ISSN 0124-7492, Vol. 18, Nº. 36, 2017 (Ejemplar dedicado a: INGENIUM), pags. 67-80
