

GUÍA DOCENTE ABREVIADA DE LA ASIGNATURA

G1675 - Energy in the World Today

Grado en Magisterio en Educación Infantil
Grado en Magisterio en Educación Primaria

Curso Académico 2020-2021

1. DATOS IDENTIFICATIVOS			
Título/s	Grado en Magisterio en Educación Infantil Grado en Magisterio en Educación Primaria		Tipología y Curso Optativa. Curso 3 Optativa. Curso 3
Centro	Facultad de Educación		
Módulo / materia	MATERIA LA ENERGÍA EN EL MUNDO HOY MÓDULO FORMACIÓN COMPLEMENTARIA O ESPECIALIZADA		
Código y denominación	G1675 - Energy in the World Today		
Créditos ECTS	6	Cuatrimestre	Cuatrimestral (1)
Web			
Idioma de impartición	Inglés	Forma de impartición	Presencial

Departamento	DPTO. FISICA APLICADA
Profesor responsable	MIGUEL ANGEL GONZALEZ SAN JOSE
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Número despacho	Facultad de Ciencias. Planta: + 3. DESPACHO PROFESORES (3029)
Otros profesores	

3.1 RESULTADOS DE APRENDIZAJE

- Acquisition of physical concept of energy in all its forms. Understanding the meaning, value and quantification of the "sources of energy." Understanding the current situation regarding reserves, use and perspectives of different current and alternative energy proposals and socioeconomic implications involved.

- Knowledge of energy units and operational knowledge and ability to calculate the transformations between them.

4. OBJETIVOS

Acquisition of the physical concept of energy in all its forms. Understanding the meaning, value and quantification of "energy sources". Understanding the current situation regarding resources, use and perspectives of the various current and alternative energy proposals and related socio-economic implications.

6. ORGANIZACIÓN DOCENTE	
CONTENIDOS	
1	1. Energy comes in many forms: mechanical, thermal, chemical, nuclear, electromagnetic ... energy. Forces, work and heat: expressions and most common units.
2	2. Transformation of energy: major processes of transformation of energy. Thermal and electrical machines.
3	3. Fossil fuels: coal, oil, gas, shale Origin and consumption. Advantages and disadvantages.
4	4. Nuclear energy: nuclear fission and fusion. Advantages and disadvantages.
5	5. Renewable energy: hydro, solar, wind, biomass, tidal, ocean thermal. Expectations, advantages and disadvantages.
6	6. The energy in the world: economy and politics, environment, public perception, sustainability expectations.

7. MÉTODOS DE LA EVALUACIÓN				
Descripción	Tipología	Eval. Final	Recuper.	%
Trabajo práctico	Otros	No	No	20,00
Evaluación continua	Otros	No	No	30,00
Examen final	Examen escrito	Sí	Sí	50,00
TOTAL				100,00
Observaciones				
<p>PLAGIARISM: Regarding the fraudulent performance (plagiarism) of the evaluation tests, the qualification will be adjusted to the established in the article 54.1 of the Regulation of the evaluation processes in the University of Cantabria: 'The fraudulent realization of the tests or activities evaluation will directly involve the grade of '0' in the subject '.</p> <p>CITATION RULES: Finally, the School Board approved that the Faculty assumes the APA RULES for all academic work as citation criteria . Although these standards have different editions, as an initial reference we attach the BUC link, hoping that this will be helpful and a reference for its development: http://web.unican.es/buc/recursos/guias-y-tutoriales/guia?g=28</p> <p>The practical work will consist of different oral presentations, individual and / or in group, with the subsequent debate, made during the class hours, related to the contents that are being taught. By its very nature, therefore, it is not recoverable.</p> <p>The continuous evaluation will consist of a set of tests and written and / or verbal exercises, carried out during the class hours, in which the student will show the conceptual, vocabulary and operative level that will be acquired as the program is delivered. By its very nature, therefore, it is not recoverable.</p>				
Criterios de evaluación para estudiantes a tiempo parcial				
The evaluation for part-time students will be the same as for the students in the face-to-face mode.				

8. BIBLIOGRAFÍA Y MATERIALES DIDÁCTICOS

BÁSICA

¿How much bioenergy can Europe produce without harming the environment?. / 2006. -- Luxemburgo. : OPOCE.
World energy outlook 2011 / International Energy Agency ;
[directed by Fatih Birol]. -- Paris : Organization for Economic Co-operation and Development (OECD) :International Energy Agency. 2011.
Energy : physical, environmental, and social impact / Gordon J. Aubrecht. -- 3rd ed. -- Upper Saddle River : Pearson Prentice Hall, cop. 2006.
ENERGY : readings from scientific american / with introductions by S. Fred Singer. -- San Francisco : W. H. Freeman, cop. 1979.
ENERGY resources and the environment / general editors, John Lenihan and William W. Fletcher. -- Glasgow ; London : Blackie, cop. 1975.
Ciencia ambiental : un estudio de interrelaciones / Eldon D. Enger, Bradley F. Smith ; con contribuciones de Anne Todd Bockarie - México, D.F. : McGraw-Hill, 2006.
Energías renovables / Jaime González Velasco. -- Barcelona : Reverté, [2009]
Energías renovables / Francisco Jarabo Friedrich, Nicolás Elortegui Escartín. -- 2ª ed. -- Madrid : S.A.P.T. Publicaciones Técnicas, 2000.
Energía y conflictos internacionales : política, tecnología y cooperación / Emilio Menéndez Pérez, Andrés Elías Feijóo Lorenzo. -- [Oleiros (La Coruña)] : Netbiblo, [2005]
<http://www.eia.gov/energyexplained/>

Esta es la Guía Docente abreviada de la asignatura. Tienes también publicada en la Web la información más detallada de la asignatura en la Guía Docente Completa.