

Caraterização da Unidade Curricular / Characterisation of the Curricular Unit

Designação da Unidade Curricular / Curricular Unit:	[3181300255] Didáticas Específicas da Matemática e das Ciências Naturais no 2.º CEB I		
	[3181300255] Didactics of Mathematics and Natural Sciences (5th and 6th grades) I		
Plano / Plan:	2015/2016		
Curso / Course:	Ensino do 1.º Ciclo do Ensino Básico e de Matemática e Ciências Naturais no 2.º Ciclo do Ensino Básico		
Grau / Diploma:	Mestre		
Departamento / Department:	CEN - Ciências Exatas e Naturais		
Unidade Orgânica / Organic Unit:	Escola Superior de Educação de Viseu		
Área Científica / Scientific Area:	Didáticas Específicas		
Ano Curricular / Curricular Year:	2		
Período / Term:	S1		
ECTS:	6		
Horas de Trabalho / Work Hours:	0162:00		
Horas de Contacto/Contact Hours:			
(T) Teóricas/Theoretical:	0000:00	(TC) Trabalho de Campo/Fieldwork:	0000:00
(TP) Teórico-Práticas/Theoretical-Practical:	0075:00	(OT) Orientação Tutorial/Tutorial Orientation:	0000:00
(P) Práticas/Practical:	0000:00	(E) Estágio/Internship:	0000:00
(PL) Práticas Laboratoriais/Practical Labs:	0000:00	(O) Outras/Others:	0000:00
(S) Seminário/Seminar:	0000:00		

Docente Responsável / Responsible Teaching

[2012] Anabela Clara Barreto Marques Novais

Outros Docentes / Other Teaching

[2012] Anabela Clara Barreto Marques Novais

[2130] Helena Margarida dos Santos Vasconcelos Gomes

Learning Outcomes of the Curricular Unit

- ? To understand the meaning of teaching Mathematics and Natural Sciences in the 2nd CEB;
- ? To mobilize and integrate their knowledge and experience of Mathematics into teaching and learning. Natural Sciences and other areas of training;
- ? To know and reflect on current curricular trends in the teaching of Mathematics and Natural Sciences;
- ? To analyze curricula and school programs in Mathematics and Natural Sciences and plan teaching practice;
- ? To analyze teaching practices and student learning processes in Mathematics and Natural Sciences, focusing on teacher and student roles, mathematical tasks and experimental activities in Natural Sciences, as well as communication and interactions in the classroom;
- ? To critically evaluate the teaching-learning practices of Mathematics and Natural Sciences in a constant search for their updating.

Learning Outcomes of the Curricular Unit (Lim:1000)

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Bibliografia / Bibliography (Lim:1000)

Galvão, C. (2002). What makes a teacher a good teacher?. In Life of science. White book on Educational Initiatives in Natural Science and Technology, ed. L. Richter & R. Engelhardt, 21 - 25. Denmark: Repro, Danish University.

Kaendler, C., et al. (2015). Teacher competencies for the implementation of collaborative learning in the classroom: a framework and research review. *Educational Psychology Review*, 27(3), 505-536.

Menezes, L., Oliveira, H., & Canavarro, A. P. (2015). Inquiry-based mathematics teaching. Gellert, U., Gimenez Rodriguez, J., Hahn, C., & Kafoussi, S. (Eds.), *Educational paths to Mathematics* (pp. 305-321). Cham: Springer

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