

Haematologica
HAEMATOL/2017/181628
Version 3

A novel nano-immunoassay method for quantification of proteins from CD138 purified myeloma cells: biological and clinical utility

Irena Misiewicz-Krzeminska, Luis Antonio Corchete, Elizabeta A. Rojas, Joaquín Martínez-López, Ramón García-Sanz, Albert Oriol, Joan Bladé, Juan José Lahuerta, Jesús San Miguel, María Victoria Mateos, and Norma C. Gutiérrez

Collaborative Groups: Grupo Español de Mieloma/Programa para el Estudio de la Terapéutica en Hemopatías Malignas (GEM/PETHEMA)
Cooperative Study Groups (Norma C. Gutierrez, Joaquin Martinez-Lopez, Ramon Garcia-Sanz, Albert Oriol, Joan Blade, Juan-Jose Lahuerta, Jesus F. San Miguel, Maria-Victoria Mateos)

Disclosures: This work was funded by a grant from the International Myeloma Foundation's Black Swan Research Initiative® and “Gerencia Regional de Salud, Junta de Castilla y León” (BIO/SA35/14). WES™ platform was acquired thanks to INNOCAMPUS Program (CEI10-1-0010). Disclosures: Joaquin Martinez-Lopez Consulting or Advisory Role: Novartis, Celgene, Janssen, Bristol-Myers Squibb Speakers' Bureau: Novartis, Celgene, Janssen, Bristol-Myers Squibb Research Funding: Novartis, Celgene, Janssen, Bristol-Myers Squibb (Inst) Albert Oriol Consulting or Advisory Role: Amgen, Janssen-Cilag Speakers' Bureau: Amgen, Janssen-Cilag Joan Blade Honoraria: Celgene, Janssen, Amgen Research Funding: Janssen (Inst) Juan-Jose Lahuerta Consulting or Advisory Role: Janssen-Cilag, Celgene Jesus F. San Miguel Consulting or Advisory Role: Amgen, Bristol-Myers Squibb, Celgene, Janssen, MSD, Novartis, Takeda, Roche Maria-Victoria Mateos Honoraria: Janssen, Celgene Speakers' Bureau: Janssen, Celgene

Contributions: IMK: Conceived the idea and designed the study, developed the protein extraction and optimized quantification technology, performed experiments, analyzed data and wrote the manuscript. LAC: performed the statistical analysis and wrote the manuscript. ERR: performed qRT-PCR and analyzed data. JML, JB, JLLH, JSM and M-VM: Supplied study material and provided myeloma samples. RGS: Provided myeloma samples and supervised qRT-PCR. AO: Provided myeloma samples. NCG: Conceived the idea and supervised the study, supplied study material, provided myeloma samples and wrote the manuscript. All authors reviewed critically and approved the manuscript.