1 <sup>st</sup> Day	08-Apr-13	
8:00am-8:15am	Opening	
Siesain Siesain	[Perming	
Session 1.1	Skeletal repair and biomaterials platforms Chairmen: J. Lane, S. Hollister	
8:15am-8:40am	Plenary No 1	2
	David J MOONEY, USA	
	Approaches to musculoskeletal tissue repair	
8:40am-8:55am	Keynote No 1	2
	Michael RAUSCHMANN, Germany	
	Development and clinical experience with augmented pedicle screws	
8:55am-9:10am	Keynote No 2	3
5.55diii 5.16diii	Khaled KEBAISH, USA	J
	Spinal deformity surgery in osteoporotic patients. Is a good outcome possible?	
9:10am-9:20am	Q&A	
9:20-10:00am	Breakfast (served)	
Session 1.2	Skeletal repair and biomaterials platforms Chairmen: J. Hirsch, P. Munk	
10:00am-10:15am	Keynote No 3	5
	Kieran MURPHY, Canada	
	Tumor, where good ideas come from? Innovation in interventions	
10:15am-10:30am	Keynote No 4	6
	Allan BROOK, USA	
	Sacroplasty and augmentation in other weight bearing bones: Practical decision paradigms	
10:30am-10:45am	Keynote No 5	6
	Giancarlo ANSELMETTI, Italy	
	Managing insufficiency fractures after transplant surgery	
10:45-11:00am	Q&A	
11:00-11:05am	Break	
Session 1.3	Skeletal repair and biomaterials platforms Chairmen: P. Sharrock, A. Kruerger	
11:05am-11:20am	Keynote No 6	8
	Scott HOLLISTER, USA	
	Modular scaffold engineering for skeletal reconstruction	
11:20am-11:35am	Keynote No 7	9
	Osamu SUZUKI, Japan	
	Biodegradable octacalcium phosphate-hyaluronic acid composites as bone substitute materials	
11:35am-11:50am	Keynote No 8	10
	Cristele COMBES, France	
	Osteo-articular pathological calcifications: a physico-chemical point of view	
11:50am-12:00pm	Q&A	
12:00pm-13:10pm	Lunch	

Session 1.4	Hip prophylaxis Chairmen: K. Kebaish, O. Suzuki	
13:10pm-13:35pm	Plenary No 2	12
	Joseph LANE, USA	
	Hip repair and prophylaxis	
13:35pm-13:50pm	Keynote No 9	13
	Jean-Michel BOULER, France	
	Bisphosphonates-combined matrices to prevent osteoporotic fracture	
13:50pm-14:05pm	Keynote No 10	14
	Jöns HILBORN, Sweden	
	Injectable BMP-2 containing hydrogels for bone regeneration	
14:05pm-14:15pm	Selected Abstract No 1	15
	Olivier GAUTHIER, France	
	Bone reconstruction with a bupivacaine-loaded injectable calcium phosphate cement can reduce	
	postoperative pain after iliac bone graft harvesting procedure in a canine model	
14:15pm-14:25pm	Selected Abstract No 2	16
	Edgar MONTUFAR, Spain	
	Discerning the role of the setting reaction on the injection behaviour of tricalcium phosphate paste	
14:25pm-14:35pm	Selected Abstract No 3	17
	Elise VERRON, France	
	Injectable BP-loaded cement to reinforce sheep osteoporotic vertebral bodies	
14:35pm-14:50pm	Q&A	

Session 1.5	Under extremities Chairmen: M. Rauschmann, S. Tutton	
14:50pm-15:10pm	Keynote No 11	19
	Thomas RUSSELL, USA	
	Calcium-phosphate in depressed tibial plateau fracture	
15:10pm-15:30pm	Keynote No 12	20
	Philip PROCTER, Switzerland	
	Designing augmentation system	
15:30pm-15:45pm	Keynote No 13	21
	Randall ERB, USA	
	Controlling the orientation of Ca-derived elements within structural composites	
15:45pm-15:55pm	Selected Abstract No 4	22
	Chris BROWN, UK	
	Developments in CaP injectable cement for screw fixation	
15:55pm-16:05pm	Selected Abstract No 5	23
	Nathalie DOUARD, France	
	Macroporous ceramics of carbonated hydroxyapatite for bone grafting applications	
16:05pm-16:15pm	Selected Abstract No 6	24
	Mohammed ARAB MOTLAGH, Germany	
	PMMA-hydroxyapatite composite material increases lifetime of augmented bone and facilitates bone	
	apposition to PMMA	
16:15pm-16:25pm	Q&A	
16:25pm-16:55pm	Coffeebreak	

Session 1.6	Scaffold for bone defects Chairmen: J.M. Bouler, M. Bohner
16:55pm-17:10pm	Keynote No 14
	Maria Pau GINEBRA, Spain
	Architecture control and characterization in injectable bone graft substitutes
17:10pm-17:25pm	Keynote No 15
	Amy J. WAGONER JOHNSON, USA
	Multiscale cell seeding in CaP scaffolds of controlled macro and microporosity
17:25pm-17:40pm	Keynote No 16
	Michael LIEBSCHNER, USA
	Development of an intra-operative artificial tissue fabrication approach for reconstruction of large defects
17:40pm-17:50pm	Selected Abstract No 7
	Marco Antonio LOPEZ HEREDIA, Germany
	Dynamic cell culture on glassy crystalline calcium alkali orthophosphates scaffolds
17:50pm-18:00pm	Short Abstract No 1 30
	Mohamed HABIB, Egypt
	Wet-chemical processto synthesisthe biphasiccalcium-phosphate powder
18:00pm-18:10pm	Q&A

2 <sup>nd</sup> Day	00 Apr 12		
2 Day	09-Apr-15		

7:00am-8:00am	Breakfast			
Caralian 2.1	In an an an and a state of			
Session 2.1	Bone augmentation	Chairmen: D. Noreiga, T. Russell		
8:00am-8:15am	Keynote No 17	32		
	Sean TUTTON, USA			
	Screw augmentation and image guid	ance		
8:15am-8:30am	Keynote No 18	33		
	Luigi MANFRE, Italy			
	Prophylactic VP			
8:30am-8:45am	Keynote No 19	35		
	Peter JARZEM, Canada			
	Does balloon kyphoplasty deliver more cement safely into osteoporotic vertebraes with posterior wall			
	defects compared to vertebroplasty?	•		
8:45am-8:55am	Selected Abstract No 8	36		
	Matti SCHOLZ, Germany			
	Cement augmented anterior screw fi	xation of dens type II osteoporotic fracture		
8:55am-9:05am	Selected Abstract No 9	37		
	Jose María TRIGUEROS LARREA, Spair	l e e e e e e e e e e e e e e e e e e e		
	Rescue from the cut-out: cement aug	gmentation of a gamma nail		
9:05am-9:15am	Selected Abstract No 10	38		
	Georgios VASTARDIS, USA			
	Cement distribution after percutaneous unilateral transpedicular balloon kyphoplasty for the mid & upper			
	thoracic spine.			
9:15am-9:25am	Selected Abstract No 11	40		
	Sven MOERK, Germany			
	Beyond the beginning-Cervial kypho	plasty		
9:25am-9:40am	Q&A			

Session 2.2	Tumor management	Chairmen: GC. Anselmetti, K. Murphy	
9:40am-9:55am	Keynote No 20		42
	Peter MUNK, Canada		
	Osteoplasty of the pelvis		
9:55am-10:10am	Keynote No 21		43
	Bassem GEORGY, USA		
	Tumor management		
10:10am-10:25am	Keynote No 22		44
	Alexis KELEKIS, Greece		
	Tumour management		
10:25am-10:35am	Selected Abstract No 12		45
	Matias ALFONSO, Spain		
	Vertebroplasty with chermotherapeutic	agents in pigs	
10:35am-10:45am	Q&A		

Session 2.3	Procedures and innovations Chairmen: S. Becker, M. Lorio	
10:45am-10:55am	Eric GILBERT, USA	17
	New Augmentation devices and regulatory hurdles	
10:55am-11:05am	Giancarlo ANSELMETTI, Italy	18
	Cancer patients treated with Kiva	
11:05am-11:15am	Anthonio KRUEGER, Germany	19
	Anatomical reconstruction technology	
11:15am-11:25am	Chris GILLIGAN, USA	19
	SJ joint technology and pain management	
11:25am-11:35am	Morgan LORIO, USA	50
	One year results from a US IDE trial evaluating the OsseoFix implant for treatment of vertebral	
	compression fractures	
11:35am-11:45am	Robert POSER, USA	51
	Initial clinical exeperience using novel radiofrequency systems for targeted ablation and augmentation of	:
	spinal tumors	
11:45am-11:55am	Kieran MURPHY, Canada	52
	A Novel Device for Radiofrequency Ablation of Bone Metastases	
11:55am-12:00pm	Q&A	
12:00pm-12:30pm	GRIBOI Assembly	
12:30pm-13:30pm	Lunch	

Session 2.4	Traumatic Vertebral Fractures Chairmen: P. Jarzem, B. Georgy	
13:30pm-13:45pm	Keynote No 23	55
	Chris BONO, USA	
	Surgical management of vertebral traumatic fractures	
13:45pm-14:00pm	Keynote No 24	56
	Natale FANCAVIGLIA, Italy	
	10-year experience in precutaneous management of traumatic vertebral fractures	
14:00pm-14:20pm	Keynote No 25	57
	David NORIEGA, Spain	
	Cranio-Caudal expandable implant for fracture management	
14:20pm-14:35pm	Keynote No 26	58
	Stephan BECKER, Austria	
	Changed focus in spine surgery: from fusion models/biomaterials to disc models/biomaterials	
14:35pm-14:45pm	Selected Abstract No 13	59
	Paul DUFORT, Canada	
	An automated algorithm for measuring 3D vertebral height restoration	
14:45pm-14:55pm	Selected Abstract No 14	60
	Anand AGARWAL, USA	
	Biodegradable cement to replace PMMA cement in management of VCF	
14:55pm-15:05pm	Selected Abstract No 15	63
	Danielle MILES, UK	
	Injectable peptide/glycosaminoglycan hydrogels and their potential use for minimally invasive nucleus	
	pulposus augmentation	
15:05pm-15:15pm	Q&A	
15:15pm-15:20pm	Break	

Session 2.5	Biomechanics 1 Chairmen: M. Bohner, M. Ginebra
15:20pm-15:35pm	Keynote No 27
	Nicolas DUNNE, UK
	Potential of fibre reinforced calcium phosphate cements for load bearing orthopaedic applications
15:35pm-15:45pm	Keynote No 28
	Elise MORGAN
	Vertebral microstructure, failure and augmentation
15:45pm-15:55pm	Selected Abstract No 16 67
	Daniel SKRZYPIEC, UK
	Effect of cement injection on mechanical properties in fractured and prophylactically augmented multiple
	myeloma vertebrae
15:55pm-16:05pm	Selected Abstract No 17 68
	Ondrej HOLUB, UK
	Is morphology alone an effective indicator when planning prophylactic vertebroplasty in multiple
	myeloma patients?
16:05pm-16:15pm	Selected Abstract No 18 69
	Sami TARSUSLUGI, UK
	Investigation of facet joint properties for the assessment of interventions in the functional spinal unit
16:15pm-16:25pm	Q&A
16:25pm-16:55pm	Coffeebreak

Session 2.5	Biomechanics 2 Chairmen: N. Dunne, M. Liebschner
16:55pm-17:10pm	Keynote No 29
	Alison JONES, UK
	Simulation of patient variance
17:10pm-17:20pm	Selected Abstract No 19 72
	Antony BOU FRANCIS, UK
	Novel 2D bone surrogate models for assessing cement injection behaviour in vertebroplasty
17:20pm-17:30pm	Selected Abstract No 20 73
	Alejandro LOPEZ, Sweden
	Mechanical and in vitro evaluation of low-modulus bone cement - Osteopal V modified with linoleic acid
17:30pm-17:40pm	Selected Abstract No 21 74
	Ingrid AJAXON, Sweden
	Compressive fatigue properties of acrylic bone cement for vertebroplasty
17:40pm-17:50pm	Selected Abstract No 22 75
	Ondrej HOLUB, UK
	Augmentation of cadaveric vertebrae with an $\alpha$ -TCP/ $\alpha$ -CSH ceramic cement
17:50pm-18:00pm	Q&A

3<sup>rd</sup> Day 10-Apr-13

Q&A

9:50am-9:55am

7:00am-8:00am	Breakfast		
Session 3.1	Beyond PMMA and CPC	Chairmen: S. Guelcher, A. J. Wagoner-Johnson	
8:00am-8:20am	Keynote No 30		77
	Charles SFEIR, USA		
	Novel resorbable calcium-phosph	nate putty for bone tissue engineering	
8:20am-8:40am	Keynote No 31		78
İ	Kerem KALPAKCI, USA		
	Market needs and regulatory chal	llenges associated with bone void fillers	
8:40am-9:00am	Keynote No 32		79
İ	Scott GUELCHER, USA		
	Injectable, settable lysine-derived	d polyurethane grafts for bone regeneration	_
9:00am-9:10am	Selected Abstract No 23		80
1	Robert Hill, UK		
	A clinical case study: using a stron	ntium substituted bioactive glass - Stronbone - to fill alveolar sockets	
9:10am-9:20am	Selected Abstract No 24		81
1	Anne TALLEY, USA		
	In vivo rhBMP-2 release from deg	radable polyurethane biocomposites	
9:20am-9:30am	Selected Abstract No 25		82
1	Margarita PRIETO, USA		
l	Effects of rhBMP-2 and mineralize	ed matrix composition on osteoclastic differentiation and resorptive	
l	activity		
9:30am-9:40am	Selected Abstract No 26		84
1	Niall KENT, UK		
L	In vivo ovine animal study of biog	glass-based calcium phosphate cement	
9:40am-9:50am	Selected Abstract No 27		85
1	Jeroen JJP van den BEUCKEN, Neth		
	Effects of an osteoporotic condition	on on the biological performance of injectable CP/PLGA cements	

Session 3.2	Hydrogels and Biologics Chairmen: W. Wagner, P. Weiss	
9:55am-10:15pm	Keynote No 33	87
	William R. WAGNER, USA	
	Thermoresponsive hydrogel development for the interruption of adverse remodelling processes in	
	ischemic cardiomyopathy	
10:15am-10:30am	Keynote No 34	88
	Jiang CHANG, China	
	Study on injectable silicates/alginate composite hydrogels	
10:30am-10:45am	Keynote No 35	89
	Pierre WEISS, France	
	Hydrogels and musculoskeletal applications	
10:45am-10:55am	Selected Abstract No 28	90
	Zhidao XIA, UK	
	Revisit immune responses to silkworm silk	
10:55am-11:05am	Selected Abstract No 29	91
	Jim TRIFFITT, UK	
	Stem cells update	
11:05am-11:15am	Selected Abstract No 30	92
	Mei WEI, USA	
	Biomimetic collagen/apatite scaffolds for bone repair and regeneration	
11:15am-11:25am	Selected Abstract No 31	93
	Andrew HARMATA, USA	
	Effects of surface modification of 45S5 bioactive glass on dynamic compressive fatigue mechanical	
11:25am-11:30am	Short Abstract No 2	94
	Agata SKWARCZYNSKA, Poland	
	Acceleration of gelation and increased mineralization of thermosensitive chitosan hydrogels by	
	incorporation of alkaline phosphate	
11:30am-11:40am	Q&A	

Session 3.3	Calcium-phosphate platform Chairmen: J. Chang, P. Sharrock	
11:40am-11:55am	Keynote No 36	96
	Patrick SHARROCK, France	
	Hydroxyapatite made easy	
11:55am-12:05pm	Selected Abstract No 32	97
	Mei WEI, USA	
	Influence of iron oxidation state on magnetic properties of iron substituted hydroxyapatite	
12:05pm-12:15pm	Selected Abstract No 33	98
	Ross ORMSBY, UK	
	Development of ion substitutued calcium phosphate cement for spinal repair	
12:15pm-12:25pm	Selected Abstract No 34	100
	Rory O'NEILL, UK	
	Experimental and analytical investigation into the mechanism of filter pressing of calcium phosphate	
	pastes during injection	
12:25pm-12:35pm	Selected Abstract No 35	101
	Seunghwan LEE, Denmark	
	Injectable lubricants for prosthetic articular joints	
12:35pm-12:45pm	Selected Abstract No 36	102
	Johanna ENGSTRAND, Sweden	
	Optimization of an acidic calcium phosphate cement with enhanced radiopacity	
12:45pm-12:55pm	Q&A	