



The 9th GCB Biomedical Science and Engineering Symposium

Dates: August 20 (Sat) -21 (Sun), 2022

Venue: < Hybrid Event> Large Conference Room, Centennial Hall, School of Medicine, Hokkaido University and Online

<DAY1>

August 2	20 (Sat)					
Starting	_	Starting	Ending	Session/Title	Presenter	
Time	Time	Time	Time			Online
JS	П	PDT		Opening remarks		
					Dr. Quynh-Thu Le	
9:00 ^	9:10	17:00 ~	17:10	From Stanford University	Professor and Chair, Department of Radiation Oncology	✓
					School of Medicine, Stanford University	
					School of Medicine, Stanford University	

9:10 ~	10:55	17:10	?	18:55	Session I	Clinical and Biomedical Physics		Online
•			-		Chair: Dr. I	Kenneth Lee Sutherland (Assistant Professor, GCB, Hokkaido University)		
							Dr. Xuejun Gu	
9:10 ~	9:55	17:10	~	17:55	Advancing	Multi-course multiple brain metastases radiosurgery: from automation to intelligence	Associate Professor of Radiation Oncology (Medical Physics)	✓
							School of Medicine, Stanford University	
							Dr. Mehmet Burcin Unlu	
9:55 ~	10:40	17:55	~	18:40	The Use of	Optical Tweezers and Photoacoustic Microscopy in Radiation Oncology	Professor, Department of Physics,	
							Boğaziçi University	
							<discussants></discussants>	
							Dr. Paul W. Sperduto (Duke University Medical Center)	
10:40 ~	10:55	18:40	~	18:55	Discussion		Dr. Hidefumi Aoyama (Hokkaido University)	
							Dr. Takahiro Kanehira (Hokkaido University)	
							Dr. Taisuke Takayanagi (Hitachi, Ltd.)	

							Online
13:00	14:45	21:00		22:45	Session II-I H&N cancer and NTCP		
•					Chair: Dr. Keiji Kobashi (Specially Appointed Associate Professor, Hokkaido University) and Dr. Koichi Yasuda (Assistant Professor, Hokkaido University)		
						Dr. Koichi Yasuda	
13:00	13:45	21:00		21:45	Radiotherapy Strategy for H&N cancer in Japan	Assistant Professor, Department of Radiation Oncology,	
						Faculty of Medicine, Hokkaido University	
						Dr. Anussara Prayongrat	
13:45	14:30	21:45		22:30	Radiotherapy Strategy for H&N cancer in Thailand	Lecturer of Radiation Oncology, Department of Radiology,	✓
						Faculty of Medicine, Chulalongkorn University	
14:30	14.45	22:30		22:45 Discussion	<discussant></discussant>		
14:30	14:45	22:30		22:45	DISCUSSION	TBD	

15:00 ^	17:00	23:00	~	1:00	Session II-II Updated Diagnosis-Specific Graded Prognostic Assessment (GPA): Personal	ized treatment selection of brain metastases	Online
C					Chair: Dr. Hidefumi Aoyama (Professor, Hokkaido University)		
						Dr. Kentaro Nishioka	
15:00 ^	5:00 ~ 15:30	23:00	~ 2	23:30	Validation of the Lung-molGPA for Japanese NSCLC patients with brain metastases	Assistant Professor, Global Center for Biomedical Science and	
						Engineering, Faculty of Medicine, Hokkaido University	
					Keynote speech: An Update of the Diagnosis-Specific Graded Prognostic Assessment (GPA) for	Dr. Paul W. Sperduto	
15:30 ^	16:30	23:30	~	0:30	Patients with Brain Metastases: A Tool to Estimate Survival, Individualize Treatment and Stratify	Adjunct Professor, Duke University Medical Center	
					Clinical Trials.	Department of Radiation Oncology	
16:30 ^	17:00	0:30	~	1.00	Discussion	<discussant></discussant>	
10.30	17.00	0.30		1.00		TBD	

<DAY2>

August 21 (Sun)
Starting Ending Starting Ending

Starting Time		Starting Time	Ending Time	Session/Title	Presenter	
10:00 ~			~ 19:45	Session III Radiation Biology		Online
		•	•	Chair: Dr. Yasuhito Onodera (Associate Professor, GCB, Hokkaido University)		
					Dr. Jin-Min Nam	
10:00 ~	10:45	18:00	18:45	Radiation-induced secretory factors for extracellular communication in tumor microenvironment	Associate Professor, Graduate School of BIOSTUDIES,	
					Kyoto University	
					Dr. Mary Helen Barcellos-Hoff	
10:45 ~	11:30	18:45	19:30	A Systems Approach to Multi-cellular Radiobiology Mediated by TGFβ	Professor, Department of Radiation Oncology,	✓
					University of California San Francisco	
11:30 ~	11:45	10.30	10:45 0:	19:45 Discussion	<discussant></discussant>	
11:30	11:45	19:30	19:45	Discussion	TBD	

13:00 ~	14:45	21:00 ~	22:45	Session IV Diagnostic Imaging		Online
			Chair: Dr. Kohsuke Kudo (Professor, Hokkaido University)			
				Cutting Edge AI Technologies in Diagnostic Imaging	Dr. Kenji Hirata	
13:00 ~	13:45	21:00 ~	21:45		Associate Professor, Department of Diagnostic Imaging,	
					Faculty of Medicine, Hokkaido University	
					Dr. Greg Zaharchuk	
13:45 ~	14:30	21:45 ~	22:30	How Artificial Intelligence Will Fundamentally Change the Practice of Radiology	Professor of Radiology (Neuroimaging and Neurointervention)	
					School of Medicine, Stanford University	
14:30 0	14:45	22:30 ~	22:45	Discussion	<discussant></discussant>	
14.50	14.43	22.50	22.43		Dr. Toshiya Osanai (Assoc. Professor, Hokkaido University)	

				Closing remarks		Online
					Dr. Yuji Kuge	
14:45 ~	14:55	22:45 ~	22:55	From Hokkaido University	Professor, Vice-Director of the GCB,	
					Faculty of Medicine Hokkaido University	