京都大学教育研究振興財団助成事業成 果 報 告 書

平成30 年 12月 1日

公益財団法人京都大学教育研究振興財団

氏 名 宋 忱潞

会	長	藤	洋	作	様

所属部局•研究科	工学研究科	
職名·学年	博士課程 2 年	

助成の種類	平成30年度 • 国際研究集会発表助成				
研究集会名	研究集会名 The 10th Asian Rock Mechanics Symposium (The International Symposium for 2018)				
発 表 形 式	□招待・□□頭・	○□ ポスター・□ その他()			
発表題目	ミトコンドリアADP/ATP 輸送体を阻害するエポキシシクロヘキセンジオン類の作用機構研究 (Epoxycyclohexenedione-type Compounds Make Up a New Class of Inhibitors of the Bovine Mitochondrial ADP/ATP Carrier)				
開催場所	ハンガリー				
渡航期間	平成30年 8月 23日 ~	平成30年 9月 1日			
成果の概要	タイトルは「成果の概要/報告者名」として、A4版2000字程度・和文で作成し、添付して下さい。「成果の概要」以外に添付する資料 🖸 無 🗆 有()				
	交付を受けた助成金額	150,000円			
	使用した助成金額	150,000円			
	返納すべき助成金額	0円			
		宿泊費: 74,326円			
会 計 報 告		渡航費: 57,740円			
	助成金の使途内訳	参加登録費: 40,000円			
		ビザ費: 10,274円			
		合計: 182,340円			
	//	(上記助成金を充当)			
(今回の助成に対する感想、今後の助成に望むこと等お書き下さい。助成事業の参考にさせていただきます。) I am grateful to thanks for the京都大学教育研究振興財団 can give me the chance to participate this symposium. That I can learn a lot knowledge for the others. This is the valuable experience for my future study and learning in the rock mechanics field.					

Program: The 10th Asian Rock Mechanics Symposium (The ISRM International Symposium for 2018)

The '京都大学教育研究振興財団' gave me a chance to participate the 10th Asian Rock Mechanics Symposium. The 10th Asian Rock Mechanics Symposium (The ISRM International Symposium for 2018) was held in the famous garden country in Singapore from Oct.28th to Nov.3th. Around more than 10 countries people got together from the whole world. This symposium relates the rock mechanics common issues especially for the natural disasters, the environment, underground structures and energy etc. All of the international researchers were positive exchanging the information and discussion, and intended to lead to the further development of the rock mechanics field in the world. This time the symposium organized in various sessions such as the rock mechanics, rock dynamics, the underground tunnel, the seismic problems etc. What's more, they organized the workshops, the parties for the students, the numerous exhibitions, site tours for leading the academic research more diversification. To achieve the useful information on a global scale. In addition, young researchers can share their own idea and learning method as a reference for ourselves.



Fig.1 The 10th ARMS conference meeting

In this conference, my presentation was arranged on Nov.1th 10:45~12:30 am, in the session of the A4 Rock property and rock mass characterization. My presentation aims at the estimation on permeability of granite single rock fracture with cyclic loading-unloading processes under various thermal conditions. To isolate the high level radioactive waste in long-term. To know the hydraulic characteristics of rock mass in long-term is important. The material of the artificial barrier always less than 100 degree, In this problem, the hydraulic characteristics of the rock mass depends on the temperature and stress of mechanical

deformation and the geo-chemical response (the mineral dissolution and precipitation) etc. But there were few experimental works aims at the hydraulic characteristics of the rock mass under various conditions. Based on this I will aims at doing the experimental work in order to learn more deeply for the temperature, stress, geo-chemical response of the hydraulic properties of the rock mass in long-term. In this conference there are few researchers aims at this problem, but for the further deeply learning of the rock mechanics field, not only for our own research, but the other fields also need to be understood. For instance, around these years, more and more researchers care about the rock dynamics fields, that will need more attentions and more deeply understanding in the future.



Fig.3 The night scence of Singapore

At last, I am grateful to thanks for the 京都大学教育研究振興財団 can give me the chance to participate this symposium. That I can learn a lot knowledge for the others. This is the valuable experience for my future study and learning in the rock mechanics field.

Thank you very much!