## Kraków 10.02.2017

## Wniosek o warsztatowy grant dziekański dla doktorantów finansowany z dotacji dla młodych naukowców

tytuł projektu: (dla doktorantów – ustalony temat badań prowadzonych w ramach doktoratu) (Project title): "3D modelling of the IOCG Sin Quyen Deposit, North Viet Nam"

imię i nazwisko kandydata:

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imię i nazwisko opiekuna naukowego :

Supervisor: Prof. Nguyen Dinh Chau

Wnoszę o przyznanie środków, które umożliwią mi przedstawić referat na temat badań na warsztatach naukowych dla doktorantów, w dniach 25/26 marca 2017 w ....

I apply for funds that allows me to present a talk about my scientific research on workshops for PhD students, on 25/26 March 2017 in Radocza Hotel.

Streszczenie wystąpienia (nie więcej niż pół strony A4).

Abstract (up to half of A4 page)

(see next page)

## Abstract

The deposit has a complex geological setting with skarn-type IOCG–REE-U located in shear zone of Red River Zone. It has hard for making a probabilistic geochemical modelling as well as 3D (digital geo-structural modelling) geometric models by using traditional methods. In this study, a 3D modelling are presented with applied knowledge and computational tools approach to construct the 3D geometric models of surface, geochemistry, ore-bodies and lithology suitable and close to reality. These models may be easy to edit and update from the variety of new data's and can supports for modelling of all kind of deposits. The methodology has been consists as a pair of various steps. These models suggest almost ore-bodies are hydrothermal vein-type and the modelling base on geophysical and geochemical data is common. Gold contribute in high grade copper and common in low grade place while uranium and rare earth elements simultaneous located in almost copper ore-bodies. Rely of the geochemical and lithological modelling and density of rocks allowed estimation of different elements reserves and relationship of ore-bodies with amphibolite and granite-geniss rocks. The results suggest some of the ore-bodies are continuous at depth and potential exploration targets of their continuations extend down-ward from their present explored levels.