

**[RIBF-ULIC-miniWS-015]  
Alpha cluster structure on  
unstable nuclei revealed by  
newly constructed SAMURAI  
spectrometer**

Thursday 19 April 2012 - Thursday 19 April 2012

RIBF Building 2F, meeting room

**Book of Abstracts**



# Contents

Opening address, SAMURAI collaboration . . . . .	1
SAMURAI overview from experimental point of view . . . . .	1
(p,p' $\alpha$ ) $\alpha$ knock-out reaction on Be isotopes . . . . .	1
$^{10}\text{Be} + \alpha$ structures in $^{14}\text{C}$ . . . . .	1
Mechanism of $\alpha + ^{24}\text{O}$ cluster structure on highly excited region on $^{28}\text{Ne}$ , Importance and possibility of measurement . . . . .	1
Measurement of the $\alpha + ^{24}\text{O}$ cluster dissociation reaction on SAMURAI and its feasibility . . . . .	1
Cluster structures in $^{40,42}\text{Ca}$ . . . . .	2
(TBA) ( $\alpha, \alpha'$ ) reaction on stable nuclei and application to unstable nuclei . . . . .	2
(TBA) Experimental approach to measure alpha condensation and possibility on SAMURAI . . . . .	2
Ne isotope highly excited state, positive-negative parity states . . . . .	2



**Session 1 / 0**

**Opening address, SAMURAI collaboration**

**Author:** Tohru Motobashi<sup>1</sup>

<sup>1</sup> *RIKEN Nishina Center*

**Session 1 / 1**

**SAMURAI overview from experimental point of view**

**Author:** Ken'ichiro Yoneda<sup>1</sup>

<sup>1</sup> *RIKEN Nishina Center*

**Session 1 / 2**

**(p,p'  $\alpha$ )  $\alpha$  knock-out reaction on Be isotopes**

**Author:** Didier Beaumel<sup>1</sup>

<sup>1</sup> *IPN Orsay - JSPS international researcher*

LOI on the last PAC meeting

**Session 1 / 3**

**$^{10}\text{Be} + \alpha$  structures in  $^{14}\text{C}$**

**Author:** Tadahiro Suhara<sup>1</sup>

<sup>1</sup> *Tsukuba University*

**Session 2 / 4**

**Mechanism of  $\alpha + ^{24}\text{O}$  cluster structure on highly excited region on  $^{28}\text{Ne}$ , Importance and possibility of measurement**

**Author:** Makoto Ito<sup>1</sup>

<sup>1</sup> *Kansai University*

**Session 2 / 5**

## **Measurement of the $\alpha + {}^{24}\text{O}$ cluster dissociation reaction on SAMURAI and its feasibility**

**Author:** Hideaki Otsu<sup>1</sup>

<sup>1</sup> *RIKEN Nishina Center*

**Session 2 / 6**

## **Cluster structures in ${}^{40,42}\text{Ca}$**

**Author:** Yasutaka Taniguchi<sup>1</sup>

<sup>1</sup> *Tsukuba University*

**Session 3 / 7**

## **(TBA) $(\alpha, \alpha')$ reaction on stable nuclei and application to unstable nuclei**

**Author:** Takahiro Kawabata<sup>1</sup>

<sup>1</sup> *Kyoto University*

**Session 3 / 8**

## **(TBA) Experimental approach to measure alpha condensation and possibility on SAMURAI**

**Author:** Masatoshi Ito<sup>1</sup>

<sup>1</sup> *CYRIC, Tohoku University*

**Session 3 / 9**

## **Ne isotope highly excited state, positive-negative parity states**

**Author:** Masaaki Kimura<sup>1</sup>

<sup>1</sup> *Hokkaido University*