



Library Indian Institute of Science Education and Research Mohali



DSpace@IISERMohali (/jspui/)

/ Thesis & Dissertation (/jspui/handle/123456789/1)

/ Master of Science (/jspui/handle/123456789/2)

/ MS Dissertation by Int. PhD (/jspui/handle/123456789/4303)

/ MS Dissertation by MP-2016 (/jspui/handle/123456789/4311)

Please use this identifier to cite or link to this item: <http://hdl.handle.net/123456789/3653>

Title: Study of $B \rightarrow J/\psi \omega K$ at Belle

Authors: Maiti, Rajesh Kumar (/jspui/browse?type=author&value=Maiti%2C+Rajesh+Kumar)

Issue Date: 24-Apr-2019

Publisher: IISERM

Abstract: Motive of this thesis is to search for $B \rightarrow XK$ decay mode, where X may be X(3872) and X(3915) and goes to $J/\psi \omega$, using the data sample of $772 \times 106 \text{ BB}^-$ pair. We performed signal Monte Carlo (MC) study for $B \rightarrow J/\psi \omega K$ decay mode and estimated the reconstruction efficiency for $B \rightarrow X(3872) K$ to be is about $9 \pm 0.1\%$ and for $B \rightarrow X(3915) K$ is about $8.6 \pm 0.1\%$. Based on $B \rightarrow J/\psi X$ Inclusive MC study we expect 51 ± 3 and 209 ± 12 events for $B \rightarrow X(3872)K$ and $B \rightarrow X(3915)K$ decay mode and the corresponding branching fraction is $7.02 \pm 0.4(\text{stat}) \times 10^{-6}$ and $3.02 \pm 0.2(\text{stat}) \times 10^{-5}$, respectively. The used data is collected by belle detector at KEK-B asymmetric e^+e^- collider.

URI: <http://hdl.handle.net/123456789/3653> (<http://hdl.handle.net/123456789/3653>)

Appears in MS Dissertation by MP-2016 (/jspui/handle/123456789/4311)
Collections:

Files in This Item:

File	Size	Format	
MP16006.pdf (/jspui/bitstream/123456789/3653/1/MP16006.pdf)	3.4 MB	Adobe PDF	View/Open (/jspui/bitstream/123456789/3653/1/MP16006.pdf)

Show full item record (/jspui/handle/123456789/3653?mode=full)

(/jspui/handle/123456789/3653/statistics)

Items in DSpace are protected by copyright, with all rights reserved, unless otherwise indicated.