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Experimental investigation of  
potential topological and  $p$ -wave  
superconductors

**Trần Văn Bảy**



# Experimental investigation of potential topological and $p$ -wave superconductors

ACADEMISCH PROEFSCHRIFT

ter verkrijging van de graad van doctor  
aan de Universiteit van Amsterdam  
op gezag van de Rector Magnificus  
prof. dr. D. C. van den Boom  
ten overstaan van een door het college voor promoties  
ingestelde commissie, in het openbaar te verdedigen  
in de Agnietenkapel  
op dinsdag 09 september 2014, te 14:00 uur.

door

**Trần Văn Bấy**

geboren te Binh Dinh, Vietnam

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*Cover:* The TiNiSi structure of UCoGe (main object, chapter 6), the reduced upper critical field  $B_{c2}(T)$  (front face, chapters 4 and 5), the  $T$ - $r$  phase diagram (top face, chapter 3) and the magnetoresistance  $\rho(B)$  (right face, chapter 6).

*An electronic version of this dissertation can be downloaded from*

<http://www.science.uva.nl/research/cmp/devisser/index.html>

*“Seek and ye shall find. Unsought goes undetected.”*

(Sophocles)

*“Use your smile to change the world; don’t let the world change your smile.”*

(Anonymous)

*To my parents,  
My sisters and brothers,  
My nieces and nephews.*