

University of Groningen

Physics of one-dimensional hybrids based on carbon nanotubes

Gao, Jia

IMPORTANT NOTE: You are advised to consult the publisher's version (publisher's PDF) if you wish to cite from it. Please check the document version below.

Document Version

Publisher's PDF, also known as Version of record

Publication date:

2011

[Link to publication in University of Groningen/UMCG research database](#)

Citation for published version (APA):

Gao, J. (2011). *Physics of one-dimensional hybrids based on carbon nanotubes*. s.n.

Copyright

Other than for strictly personal use, it is not permitted to download or to forward/distribute the text or part of it without the consent of the author(s) and/or copyright holder(s), unless the work is under an open content license (like Creative Commons).

The publication may also be distributed here under the terms of Article 25fa of the Dutch Copyright Act, indicated by the "Taverne" license. More information can be found on the University of Groningen website: <https://www.rug.nl/library/open-access/self-archiving-pure/taverne-amendment>.

Take-down policy

If you believe that this document breaches copyright please contact us providing details, and we will remove access to the work immediately and investigate your claim.

Downloaded from the University of Groningen/UMCG research database (Pure): <http://www.rug.nl/research/portal>. For technical reasons the number of authors shown on this cover page is limited to 10 maximum.

Acknowledgements

This dissertation is the result of four-year work in the group of Photophysics and OptoElectronics, Zernike Institute for Advanced Materials at University of Groningen. I still remember the first day I arrived in the Netherlands and started my adventure. Time flies...now I want to give my sincere acknowledgements to all the people helped me during this period.

First of all, I would like to express my gratitude to my supervisor, Prof. Maria Antonietta Loi, who offered me the position and provided me great supervision. I was so lucky to be a student in your group because you are always there helping me on experimental design, data analysis, paper writing, presentation, almost everything in research. You also provide me so many opportunities to collaborate with many others and to present our work in many conferences. Dear Maria, I deeply appreciate your encouragement, patience, support and trust. What I have learned from you will be a treasure in my life.

Sincere acknowledgements go to the members of the reading committee, Prof. Robin Nicholas and Prof. Giovanni Bongiovanni for reading and evaluating my thesis. I also want to thank Giovanni for supporting my visit to your lab in Cagliari. It was a great scientific experience, also the food there was very impressive.

Very special thanks go to Prof. Andreas Herrmann, who is also the member of the reading committee. I probably have spent the same amount of time in your lab and in our lab without paying for a bottle of solvent. Thank you very much for your generosity and for many supports.

Next, I want to acknowledge all the crew on the board of "NaphoD". It was a great experience for me to be involved in this European framework and to work with all of you. I want to thank our producer in both materials and arts: Prof. Enzo Menna, Dr. Pascal Blondeau and Dr. Patrizio Salice; our observers: Prof. Cécile Hébert and Dr. Barbora Bártoová; our thinker: Prof. Claudia Ambrosch-Draxl and Dr. Matus Milko.

I want to thank Prof. Maria Cristina dos Santos and Elton José Figueiredo de Carvalho in University of San Paulo for their contribution in our research collaboration. You have told me many nice things about Brazil and I will certainly pay a visit to your country in the future.

Many thanks to my best colleagues and friends in the group of Photophysics and OptoElectronics.

Fabrizio, you are the one taught me how to survive in a laser lab and how to make good characterization at the beginning. I learned a lot from you and I really appreciate it.

Thanks go to Dorota for many helps in the laser lab and for sharing the lab duties. I wish you and your Dr. Right (Filippo) a very happy life in Australia.

Kristina, thank you for many helps in the clean room and for being my paranymph. You always spread joy with your contagious laughter and I wish you happy all the time.

Marianna, thank you for being my paranymph. It was indeed a very nice experience to work with you in the same group. You are always considerate and amusing. Your presence in the laser lab makes it more colorful.

Alex, thank you for many suggestions and enlightening discussion. I'm always impressed by your interesting experience, unique opinion and more often by your intelligence. Good luck in UCSB and enjoy the sunlight in California!

Claudia, thank you for many valuable discussions in device related projects and for the information about postdoc life in USA.

Simone, my Italian buddy. Thank you for your company in the university and in several restaurants. You are probably the only one who thinks the uncooked bread was tasty as I did. I wish you all the bests in your life.

Widi and Satria, it is a pity that you joined the group when I was about to leave. Good luck in the POE group and I know you will do great work here.

I want to thank all of my colleagues in the group of MEPOS: Prof. Paul Blom and Prof. Dago de Leeuw (I respect your attitude in research and your responsibility for your students), Martijn Kuik (thanks for helping me to find my passport in the post office), Johan, Gert-Jan, Jan Kotlarski (thanks to all three of you for helping me with the translation), Paul, Herman, Francesco, Mengyuan, Fatemeh, Ilias, Mark-Jan, Jolt, Milo, Anne-Marije, Jan Anton, Date, Auke, Hylke, Kamal, Irina, Yuan, Lenes, et al and in the group of PCBE: my friend Minseok, Jan Willem, Agnieszka, Deepak, Jur, Anke, Alina, Andrew, Alessio, Diego, Andreas, Alberto, et al.

Sincere thanks to our secretary Renate and technicians Frans, Arjen and Jan. I could not imagine a smooth research life without none of you. Renate always shows magic in managing all my paperwork and I do appreciate your help. I want to thank Frans and Arjen for your supports in the lab also in the maintenance of my computer. Thanks also go to Jan for the best organized clean room and for your help on my moving when I just arrived.

Thanks to Prof. Poolman, Gea and Ria in the biochemistry department for the access to the (ultra)centrifuges.

I also would like thank the students worked with me: KB, Ruud, Vladimir and Igor. You are all working as Master or PhD students now and I wish you the best future.

Thanks to all of my Chinese friends in RuG for the happy time we spent together. Fengpin and xiaomeng, Youchun, Lifei, Shengjun and Zhaoshuang, Wuyu and Liuji, Daren, Maobin, Yinjie, Wenqiang, Wubian, Huanjun, Xiaoran, Liukai, Chenwei, Xiaoming, Zhangzheng, Chungwen.

I want to express my best gratitude to my parents, my sister, brother in law and my nephew Jimmy. My dearest parents, thank you for your consideration and support all the time.

Last but not least, I want to thank the most special person in my life. My best friend, my soul mate, my sunlight, my wife: Zhe Guo. You are the best I could ever wish for. Thank you for everything you have done for me. Our life adventure just starts and I know it will be full of happiness and surprises. I love you and I will be loving you...always.

It is not easy to remember all the people helped me, especially those in the smoking community. Please accept my apologies if your name is not mentioned here.