

Publications

BS/MS and Ph.D. theses:

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- T1. Richter S. (1997) Reattività del diterpenoide clerocidina verso il DNA e i suoi componenti. Tesi di laurea. *Dipartimento di Scienze Farmaceutiche-Prof. M. Palumbo, Università di Padova.*
- T2. Richter S. (2000) Inibizione delle interazioni proteine-acidi nucleici: nuovi approcci terapeutici. Tesi di dottorato di ricerca in Scienze Farmaceutiche. *Dipartimento di Scienze Farmaceutiche-Prof. M. Palumbo, Università di Padova.*
- T3. Richter S. (2004) Antiviral 6-aminoquinolones: molecular basis for potency and selectivity. Tesi di dottorato di ricerca in Virologia. *Dipartimento di Istologia, Microbiologia e Biotecnologie Mediche – Prof. G. Palu', Università di Padova.*

Publications on international journals with reviewers:

* indicates corresponding author, [§] indicates co-first author

- P1. Hwang S., Tamilarasu N., Ryan K., Huq I., Richter S., Clark Still W. & Rana TM. (1999). Inhibition of gene expression in human cells through small molecule RNA interactions. *Proc. Natl. Acad. Sci. USA* **96**, 12997-13002.
- P2. Sissi C., Moro S., Richter S., Gatto B., Menta E., Spinelli S., Krapcho A.P., Zunino F., & Palumbo M. (2001). DNA-interactive anticancer aza-anthrapyrazoles: biophysical and biochemical studies relevant to the mechanism of action. *Mol. Pharm.* **59**(1), 96-103.
- P3. Supino R., Polizzi D., Pavesi R., Pratesi G., Guano F., Capranico G., Palumbo M., Sissi C., Richter S., Beggolin G., Menta E., Pezzoni G., Spinelli S., Torriani D., Carenini N., Dal Bo L., Facchinetti F., Tortoreto M., Zunino F. (2001). A Novel 9-Aza-Anthrapyrazole Effective against Human Prostatic Carcinoma Xenografts. *Oncology* **61**(3):234-42.
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- P7. Richter S., Ping YH., Rana TM. (2002) TAR RNA loop: A scaffold for the assembly of a regulatory switch in HIV replication. *Proc. Natl. Acad. Sci. USA* **99**(12): 7928-7933.
- P8. Richter S., Palumbo M. (2003) Alternative approaches to the discovery and development of telomerase-targeted anticancer drugs. *Minireviews in Medicinal Chemistry* **3**(1): 37-50.
- P9. Richter S., Gatto B., Fabris D., Takao KI., Kobayashi S., Palumbo M. (2003) Clerocidin alkylates DNA through its epoxide function: evidence for a fine tuned mechanism of action. *Nucleic Acids Res.* **31**(17):5149-56.
- P10. Gelman MA., Richter S.[§], Cao H., Umezawa N., Gellman SH., Rana TM. (2003) Selective binding of TAR RNA by a Tat-derived β -peptide. *Organic Letters* **5**(20):3563-3565.
- P11. Richter S., Fabris D., Binaschi M., Gatto B., Capranico G. and Palumbo M. (2004) Effects of common buffer systems on drug activity: the case of clerocidin. *Chem. Res. Toxicol.*, **17**(4):492-501.
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- P13. Richter S., Parolin C., Palumbo M., Palù G. (2004) Antiviral properties of quinolone-based drugs. *Curr. Drug Targets Infect. Disord.*, **4**(2):111-116.
- P14. Richter SN., Menegazzo I., Fabris D., and Palumbo M. (2004) Concerted bis-alkylating reactivity of clerocidin towards unpaired cytosine residues in DNA. *Nucleic Acids Res.* **32**(18):5658-5667. DOI 10.1093/nar/gkh898
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- P16. Richter SN., Fabris D., Moro S., and Palumbo M. (2005) Dissecting reactivity of clerocidin towards common buffer systems by means of selected drug analogues. *Chem. Res. Toxicol.*, **18**(1):35-40. DOI 10.1021/tx049858i

- P17. Richter SN., Gatto B., Fravolini A., and Palumbo M. (2005) Antiviral 6-amino-quinolones: molecular basis for potency and selectivity. *Bioorg. Med. Chem. Letters*, **15**(19):4247-4251. DOI 10.1016/j.bmcl.2005.06.074
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- P22. Richter SN., Bélanger F., Zheng P., and Rana TM. (2006) Dynamics of nascent mRNA folding and RNA-Protein interactions: an alternative TAR RNA structure is involved in the control of HIV-1 mRNA transcription. *Nucleic Acids Res.*, **34**(15):4278-4292. DOI 10.1093/nar/gkl499
- P23. Verga D., Richter SN., Palumbo M., Gandolfi R. and Freccero M. (2007) Bipyridyl Ligands as Photoactivatable Mono- and Bis-Alkylating Agents Capable of DNA Cross-Linking. *Org. Biomol. Chem.*, **5**(2):233-235 DOI 10.1039/B616292D
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- P27. Richter SN.*, Nadai M., Menegazzo I., Moro S. and Palumbo M. (2009) Reactivity of Clerocidin towards adenine: implications for base modulated DNA damage. *Org. Biomol. Chem.*, **7**(5):976-985. DOI 10.1039/B819049F
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- P29. Di Antonio M., Doria F., Richter SN., Bertipaglia C., Mella M., Sissi C., Palumbo M., Freccero M. (2009) Quinone Methides Tethered to Naphthalene Diimides as Selective G-Quadruplex Alkylating Agents. *J. Am. Chem. Soc.*, **131**(36):13132-41. DOI 10.1021/ja904876q
- P30. Richter SN.*, Frasson I., Palumbo M., Sissi C., and Palù G. (2010) Simocyclinone D8 turns on against Gram-negative bacteria in a clinical setting. *Bioorg. Med. Chem. Lett.*, **20**(3): 1202-1204. DOI 10.1016/j.bmcl.2009.11.135
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- P34. Nadai M., Doria F., Di Antonio M., Sattin G., Germani L., Percivalle C., Palumbo M., Richter SN.*, Freccero M. (2011) Naphthalene diimide scaffolds with dual reversible and covalent interaction properties towards G-quadruplex. *Biochimie*, **93**(8):1328-2340 DOI 10.1016/j.biochi.2011.06.015
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- P37. Richter SN.*, Frasson I., Biasolo MA., Bartolini A., Cavallaro A., Palù G. (2012) Ultra-rapid detection of *bla*_{KPC1/2-12} by real-time PCR from perirectal and nasal swabs. *J. Clin. Microbiol.* **50**(5):1718-20 DOI 10.1128/JCM.00195-12
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- P45. Perrone R., Nadai M., Frasson I., Poe JA., Butovskaya E., Smithgall TE., Palumbo M., Palù G., Richter SN.* (2013) A dynamic G-quadruplex region regulates the HIV-1 long terminal repeat promoter. *J. Med. Chem.* **56**(16):6521-30 DOI:10.1021/jm400914r
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- P55. Perrone P., Butovskaya E., Lago S., Garzino-Demo A., Pannecouque C., Palù G., Richter SN*. (2016) The G-quadruplex-forming aptamer AS1411 potently inhibits HIV-1 attachment to the host cell. *Int. J. Antimicrob. Agents*. **47**(4):311-316 doi:10.1016/j.ijantimicag.2016.01.016 Open Access funded by the Bill & Melinda Gates Foundation
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- P58. Lopercolo A., Perrone R., Tortoreto M., Doria F., Beretta GL., Zuco V., Freccero M., Lanzi C., Richter SN.*, Zaffaroni N., Folini M. (2016) Targeting RET Oncogene in Medullary Thyroid Cancer through Gene Promoter G-quadruplex Stabilization by a Naphthalene Diimide Derivative. *Oncotarget* **7**(31):49649-49663 doi: 10.18632/oncotarget.10105
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- P62. Lago S., Tosoni E., Nadai M., Palumbo M., Richter SN.* (2016) The cellular protein nucleolin preferentially binds long-looped G-quadruplex nucleic acids. *BBA-General Subjects* **1861**(5, B):1371-1381 doi: 10.1016/j.bbagen.2016.11.036
- P63. Rocca R., Moraca F., Costa G., Nadai M., Scalabrin M., Talarico C., Distinto S., Maccioni E., Ortuso F., Artese A., Alcaro S., Richter SN. (2016) Identification of G-quadruplex DNA/RNA binders: Structure-based virtual screening and biophysical characterization. *BBA-General Subjects* **1861**(5 Pt B):1329-1340 doi: 10.1016/j.bbagen.2016.12.023
- P64. Doria F., Nadai M., Zuffo M., Perrone R., Freccero M., Richter SN.* (2017) Detection of nuclear DNA G-quadruplexes by a red-NIR fluorescent dye: in vitro analysis and cell imaging. *Chem. Commun.* **53**(14):2268-2271. 10.1039/C6CC08492C
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- P67. Perrone R., Lavezzo E., Palù G., Richter SN.* (2017) Conserved presence of G-quadruplex forming sequences in the Long Terminal Repeat Promoter of Lentiviruses. *Sci. Rep.* **7**(1):2018; doi: 10.1038/s41598-017-02291-1
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- P71. Scalabrin M., Palumbo M., Richter SN.* (2017) Buffer optimization for the detection of G-quadruplex-folded oligonucleotides and their complexes with small molecules by electrospray ionization mass-spectrometry. *Anal. Chem.* **89**(17):8632-8637 doi: 10.1021/acs.analchem.7b01282
- P72. Lago S., Rossetto M., Nadai M., Richter SN.* New immobilization protocol for surface plasmon resonance analysis of the interaction of G-quadruplex nucleic acids and a monoclonal antibody. *BBA-General Subjects. In print*

- P73. Ruggiero E., Richter SN.* G-quadruplexes and G-quadruplex ligands: targets and tools in antiviral therapy. *Nucleic Acids Res.* **46**(7):3270-3283. doi: 10.1093/nar/gky187
- P74. Tassinari M., Cimino-Reale G., Nadai M., Doria F., Butovskaya E., Recagni M., Freccero M., Zaffaroni N., Richter SN.*, Folini M. (2018) Down-regulation of the Androgen Receptor by G-quadruplex Ligands Sensitizes Castration-resistant Prostate Cancer Cells to Enzalutamide, *submitted*
- P75. Lavezzo E., Berselli E., Frasson I., Perrone R., Palù G., Brazzale A., Richter SN.*, Toppo S. (2018) G-quadruplex forming sequences in the genome of all known human viruses: a comprehensive guide, *submitted*
- P76. Nadai M., Doria F., Scalabrin M., Pirota V., Grande V., Bergamaschi G., Amendola V., Richter SN.*, Freccero M. (2018) Naphthalene Diimide with a Copper Core: a Catalytic and Selective Scissoring Tool for Quadruplex Nucleic Acids, *submitted*
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- P78. Tassinari M., Lena A., Butovskaya E., Pirota V., Nadai M., Freccero M., Doria F., Richter SN. (2018) A fragment-based approach for the development of G-quadruplex ligands: role of the amidoxime moiety, *submitted*

Publications of international/national journals without reviewers:

- A1. Bartolini A., Frasson I., Biasolo MA., De Canale E., Tommasini T., Boldrin C., Rossi L., Richter SN., Cavallaro A. (2013) Emergence of carbapenem resistance in Enterobacteriaceae strains in Padua (Italy) from January 2008 to July 2012: phenotypic and genotypic assays. *Microbiologia Medica* **28**(1):40-42 DOI: <http://dx.doi.org/10.4081/mm.2013.2281>
- A2. Perrone R., Artusi S., Butovskaya B., Nadai M., Pannecouque C., Richter SN.* (2015). G-Quadruplexes in the Human Immunodeficiency Virus-1 and Herpes Simplex Virus-1: New Targets for Antiviral Activity by Small Molecules, *IFMBE Proceedings*, **46**:207-210 DOI: 10.1007/978-3-319-11776-8_50

Communications at conferences:

- C1. Richter S., Zagotto G., Gatto B., Binaschi M., Capranico G., & Palumbo M. (1998). Interaction between the cytotoxic drug clerocidin and DNA: evidence for covalent adduct formation. *Eur.J. Pharm. Sci.* **6**, 228, S57.
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- C25. Nadai M., Richter SN., Frasson I., Calistri A., Parolin C., Palù G. Identification of critical residues involved in HIV-1 Nef oligomerization and screening of new inhibitory compounds in mammalian cells by means of Bimolecular Fluorescence Complementation. *Abstract Book of the 8th National Congress of the Italian Society of Virology (SIV), Orvieto (TR), Italy* (21-23/09/2008), p26.
- C26. Cavallaro A., Bolzonella S., Bergo C., Palù G., Richter SN. Qnr plasmid-mediated quinolone resistance determinants among Escherichia coli and Klebsiella pneumoniae isolates from Italy. *Abstract book RICAI 2008 (28^e Réunion interdisciplinaire de chimiothérapie anti-infectieuse), Paris, France* (04-05/12/2008), p133. **oral presentation**

- C27. Bergo C., Frasson I., Richter S., Cavallaro A. Basso Livello di resistenza ai fluochinoloni mediato dai geni qnr in ceppi produttori di ESBL. *Abstract Book del XXXVIII Congresso Nazionale AMCLI (Associazione Microbiologi Clinici Italiani)* Rimini, Italia (17-20/11/2009). **oral presentation**
- C28. Frasson I., Bergo C., Cavallaro A., Palù G., Richter S.N. Diffusione della resistenza mediata da plasmide di tipo qnr, aac(6['])-Ib-cr e qepA nel Nord-Est Italia. *Abstract Book del XXXVIII Congresso Nazionale AMCLI (Associazione Microbiologi Clinici Italiani)* Rimini, Italia (17-20/11/2009). #176.
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- C30. Frasson I., Bergo C., Palu G., Cavallaro A., Richter S.N. Spread of carbapenemases in enterobacterial strains from Italy. *Abstract book RICAI 2010 (30^e Réunion interdisciplinaire de chimiothérapie anti-infectieuse)*, Paris, France (02-03/12/2010), #514.
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- C32. Doria F., Nadai M., Di Antonio M., Percivalle C., Germani L., Petenzi M., Palumbo M., Richter SN., Freccero M. G-Quadruplex Covalent Interaction by Substituted Naphthalene Diimide. *Abstract Book Third International meeting on G-quadruplex and G-assembly, Naples, Italy* (28/06-01/07/2011), #19
- C33. Doria F., Nadai M., Di Antonio M., Percivalle C., Petenzi M., Germani L., Palumbo M., Richter SN., Freccero M. Generation and Chemistry of Quinone Methides Targeting G-quadruplexes. *Abstract Book Third International meeting on G-quadruplex and G-assembly, Naples, Italy* (28/06-01/07/2011), #24.
- C34. Perrone R., Frasson I., Nadai M., Freccero M., Palù G., Richter SN., Investigation of nucleic acid secondary structures in the HIV-1 integrated genome. *Abstract Book of the 10th National Congress of the Italian Society of Virology (SIV), Orvieto (TR), Italy* (12-14/09/2011), #35 p51.
- C35. Richter S. G-quadruplex and cancer control. *Program Syllabus The 2nd Hallym-Padova International Symposium. New insights in modern medicine, Padua, Italy* (17-18/10/2011). **oral presentation.**
- C36. Richter S. Meccanismi molecolari in *Klebsiella pneumoniae*: selezione e trasmissione. *Convegno "Gram negativi con resistenza multiclasse: problemi diagnostici, terapeutici ed assistenziali"*, Pauda, Italy (21/10/2011) **oral presentation.**
- C37. Richter S. Analisi genotipica delle resistenze: esempi in Enterobacteriaceae. *Convegno "Interpretazione dell'antibiogramma: modello europeo e modello americano e loro rilevanza per la gestione clinica"*, Padua, Italy (25/10/2011) **oral presentation.**
- C38. Frasson I., Cavallaro A., Franchin E., Parisi S., Palù G., Richter SN. Evolving epidemiology of carbapenem-resistant Enterobacteriaceae: molecular characterisation of KPC-positive strains and circulating plasmids. *Clin. Microbiol Infect.* 2012, 18(s3):#P1197 p298. 22nd ECCMID, London, UK (31/03- 03/04/2012)
- C39. Artusi S., Piccoli E., Calistri A., Palù G., Richter SN. Non-canonical DNA structures in the Herpes simplex virus-1 genome: biophysical characterization and antiviral effects. *Abstract Book of the 11th National Congress of the Italian Society of Virology (SIV), Orvieto (TR), Italy* (17-19/09/2011), #24 p38.
- C40. Perrone R., Nadai M., Del Vecchio C., Frasson I., Palumbo M., Palù G., Parolin C., Richter SN. Biophysical characterization and antiviral effect of a cluster of G-quadruplex forming sequences in the HIV-1 *nef* coding region. *Abstract Book of the 11th National Congress of the Italian Society of Virology (SIV), Orvieto (TR), Italy* (17-19/09/2011), #36 p42.
- C41. Doria F., Nadai M., Percivalle C., Germani L., Petenzi M., Sattin G., Richter SN., Freccero M. Naphthalene diimides as engineered G-quadruplex alkylating ligand. *Abstract Book of COST Action MP0802 Final Conference "Conformational diversity and applications of G-quadruplexes"*, Sitges (Barcelona) Spain (06-08/10/2012), #6 p50.
- C42. Nadai M., Doria F., Folini M., Scalabrin M., Germani L., Sattin G., Mella M., Palumbo M., Zaffaroni N., Fabris D., Freccero M. and Richter SN. Selective targeting of loop adenines in G-quadruplex by masked and intrinsically reactive electrophiles. *Abstract Book of COST Action MP0802 Final Conference "Conformational diversity and applications of G-quadruplexes"*, Sitges (Barcelona) Spain (06-08/10/2012), #22 p71.
- C43. Perrone R., Nadai M., Del Vecchio C., Frasson I., Palumbo M., Parolin C., Palù G. and Richter SN. Formation of a unique cluster of G-quadruplex structures in the HIV-1 *nef* coding region: implications for antiviral activity. *Abstract Book of COST Action MP0802 Final Conference "Conformational diversity and applications of G-quadruplexes"*, Sitges (Barcelona) Spain (06-08/10/2012), #27 p77.

- C44. Frasson I., Lavezzo E., Franchin E., Toppo S., Barzon L., Cavallaro A., Palù G. and Richter S.N. Complete sequence of pKPN101-IT, a novel plasmid harbouring the blaKPC-2 beta lactamase gene in a Klebsiella pneumoniae ST101 isolated from a patient in Italy. *Book of Abstracts of the 2nd International conference on antimicrobial research, Lisbon, Portugal, (21-23/11/2012)*, p386 **oral presentation**
- C45. Bartolini A., Frasson I., Biasolo MA., De Canale E., Tommasini T., Boldrin C., Rossi L., Richter SN., Cavallaro A. Emergence of carbapenem resistance in Enterobacteriaceae strains in Padua (Italy) from January 2008 to July 2012: phenotypic and genotypic assays. *Clinical and Diagnostic Microbiology*, Vol. 28 (1), 2013, #1874, pp. 40-42
- C46. Perrone R., Nadai M., Frasson I., Butovskaya E., Mantelli B., Palumbo M., Palù G., Richter SN. A Dynamic G-Quadruplex Region Regulates the HIV-1 Long Terminal Repeat Promoter. *Abstract Book of the IV International Meeting of G-quadruplex Nucleic Acids, from Structure to Chemistry and Biology, Sinagapore (01-04/07/2013)*, Oral Presentation 4 and Poster 1. **oral presentation**
- C47. Doria F., Petenzi M., Richter SN., Freccero M. Covalent Targeting of G-Quadruplex Structures by Naphthalene Diimide Conjugated Electrophiles. *Abstract Book of the IV International Meeting of G-quadruplex Nucleic Acids, from Structure to Chemistry and Biology, Sinagapore (01-04/07/2013)*, Oral Presentation 20 and Poster 8. **oral presentation**
- C48. Doria F., Germani L., Nadai N., Richter SN., and Freccero M. A Selective G-quadruplex Alkylating Agent Activated by Green Light. *Abstract Book of the IV International Meeting of G-quadruplex Nucleic Acids, from Structure to Chemistry and Biology, Sinagapore (01-04/07/2013)*, Poster 35.
- C49. Nadai M., Palumbo M., Richter SN. Clerocidin-mediated DNA Footprinting Discriminates among Different G-Quadruplex Conformations and Detects Tetraplex Folding in a Duplex Environment. *Abstract Book of the IV International Meeting of G-quadruplex Nucleic Acids, from Structure to Chemistry and Biology, Sinagapore (01-04/07/2013)*, Poster 59.
- C50. Perrone R., Nadai M., Frasson I., Butovskaya E., Poe JA., Palumbo M., Palù G., Smithgall TE., Richter SN. Targeting G-quadruplexes in the HIV-1 Integrated Genome: A Novel Antiviral Strategy? *Abstract Book of the IV International Meeting of G-quadruplex Nucleic Acids, from Structure to Chemistry and Biology, Sinagapore (01-04/07/2013)*, Poster 74.
- C51. Artusi S., Nadai M., Doria F., Freccero M., Richter SN. Synthesis and G-Quadruplex Binding and Selectivity of Novel Tri- and Tetra-Substituted Ethynyl Naphthalene Diimides. *Abstract Book of the IV International Meeting of G-quadruplex Nucleic Acids, from Structure to Chemistry and Biology, Sinagapore (01-04/07/2013)*, Poster 78.
- C52. Perrone R., Nadai M., Frasson I., Butovskaya E., Palumbo M., Palù G., Richter SN. A dynamic G quadruplex region regulates the HIV 1 LTR promoter. *Virologie*, vol 17, supplement Septembre 2013, 5th European Congress of Virology, Lyon, France (11-14/09/2013), Ref O34, S50. **oral presentation**
- C53. Artusi S., Biasolo MA., Calistri A., Palù G., Richter SN. Biophysical characterization and antiviral effects of non canonical DNA structures in the herpes simplex virus type 1 genome. *Virologie*, vol 17, supplement Septembre 2013, 5th European Congress of Virology, Lyon, France (11-14/09/2013), Ref O114, S88. **oral presentation**
- C54. Perrone R., Artusi S., Butovskaya E., Nadai M., Pannecouque C., Richter SN. G-quadruplexes in the human immunodeficiency virus-1 and herpes simplex virus-1: new targets for antiviral activity by small molecules. *Abstract Book of the 5th International Conference on the Development of Biomedical Engineering in Vietnam, Ho Chi Minh City, Vietnam (16-18/06/2014)*. **Invited presentation**
- C55. Artusi S., M. Nadai M., Biasolo MA., Palù G., Flamand L., Calistri A., Richter SN. The Herpes Simplex Virus-1 genome contains multiple clusters of repeated G-quadruplex: Implications for the antiviral activity of a G-quadruplex ligand. *Abstract Book of the 3rd Antiviral Conference, Amsterdam, The Netherlands (12-14/10/2014)*, [O5-01] **oral presentation**
- C56. Perrone R., Butovskaya E., Daelemans D., Palù G., Pannecouque C., Richter SN. Anti-HIV-1 activity of the G-quadruplex ligand BRACO-19 *Abstract Book of the 3rd Antiviral Conference, Amsterdam, The Netherlands (12-14/10/2014)*, poster [P.11].
- C57. Artusi S., Frasson I., Perrone R., Calistri A., Flamand L., Palu' G., Richter SN. Antiviral Activity of a G-Quadruplex Ligand Against Herpes Simplex Virus-1. *Abstract Book of the 28th International Conference on Antiviral Research, Rome, Italy (11-15/05/2015)*, poster 155.
- C58. Perrone R., Palu' G., Pannecouque C., Richter SN. A G-Quadruplex Forming Aptamer Potently Inhibits HIV-1 Entry into the Host Cell. *Abstract Book of the 28th International Conference on Antiviral Research, Rome, Italy (11-15/05/2015)*, poster 217.
- C59. Tosoni E., Frasson I., Scalabrin M., Perrone R., Butovskaya E., Nadai M., Fabris D., Richter SN. A Cellular Protein Induces and Stabilizes the HIV-1 LTR G-Quadruplex Conformation, a Key Regulatory Element of Viral Transcription and New Antiviral Target. *Abstract Book of the 28th International Conference on Antiviral Research, Rome, Italy (11-15/05/2015)*, poster 236.

- C60. Nadai M., Doria F., Richter SN., Freccero M. Photochemistry gives the green light to Tel22 Thymine targeting. *Abstract Book of the 5th International Meeting on Quadruplex Nuclei Acids: G4thering in Bordeaux, Bordeaux, France (26-28/05/2015)*, O31, **oral presentation**
- C61. Artusi, S., Perrone R., Frasson I., Butovskaya E., Flamand L., Lansdorp PM., Richter SN. G-quadruplexes in the herpes simplex virus-1: presence, function and targeting in vitro and in infected cells. *Abstract Book of the 5th International Meeting on Quadruplex Nuclei Acids: G4thering in Bordeaux, Bordeaux, France (26-28/05/2015)*, O49, **oral presentation**
- C62. Tassinari M., Perrone R., Pannecouque C, Richter SN. A G-quadruplex forming aptamer potently inhibits HIV-1 entry into the host cell. *Abstract Book of the 5th International Meeting on Quadruplex Nuclei Acids: G4thering in Bordeaux, Bordeaux, France (26-28/05/2015)*, poster Tue-P09 + **flash presentation**
- C63. Tosoni E., Frasson I., Perrone R., Scalabrin M., Butovskaya E., Nadai M., Fabris D., Richter SN. A cellular protein induces and stabilizes the HIV-1 LTR G-quadruplex conformation, a key regulatory element of viral transcription and new antiviral target. *Abstract Book of the 5th International Meeting on Quadruplex Nuclei Acids: G4thering in Bordeaux, Bordeaux, France (26-28/05/2015)*, poster Tue-P47
- C64. Nadai M., Tassinari M., Butovskaya E., Perrone R., Doria F., Freccero M., Richter SN. Extended core naphthalene diimides as G-quadruplex sensors and improved anticancer compounds. *Abstract Book of the 5th International Meeting on Quadruplex Nuclei Acids: G4thering in Bordeaux, Bordeaux, France (26-28/05/2015)*, poster Wed-P15.
- C65. Moraca F., Richter SN., Alcaro S. Targeting G-quadruplex DNA LTR sequences to identify new anti-HIV-1 binders. *Abstract Book of the 5th Meeting of the Paul Ehrlich MedChem Euro-PhD Network, Krakow, Poland (3-5/07/2015)*, poster P33.
- C66. Perrone R., Butovskaya E., Lago S., Garzino-Demo A., Pannecouque C., Doria F., Freccero M., Palù G., Richter SN. G-Quadruplex-based approaches to inhibit the HIV-1 entry process. *Abstract Book of the 6th European Congress of Virology, Hamburg, Germany (19-22/10/2016)*, poster P3-9.
- C67. Callegaro S., Perrone R., Scalabrin M., Freccero M., Richter SN. G-Quadruplex mediated anti-HSV-1 activity of a core extended Naphthalene Diimide compound. *Abstract Book of the 6th European Congress of Virology, Hamburg, Germany (19-22/10/2016)*, poster P17-13.
- C68. Richter SN., Perrone R., Tosoni E., Frasson I., Scalabrin M., Butovskaya E., Tassinari M., Doria F., Lago S., Ruggiero E., Nadai M., Phan A.T., Fabris D., Freccero M., Palù G. Presence, function and targeting of G-quadruplexes in the HIV-1 LTR promoter. *Abstract Book of the 6th European Congress of Virology, Hamburg, Germany (19-22/10/2016)*, poster P17-15.
- C69. Lago S., Tosoni E., Nadai M., Richter SN. The cellular protein nucleolin preferentially binds long-looped G-quadruplex nucleic acids. *Abstract Book of the 4th Italian experience in biomedical research: young minds at work, Desenzano del Garda, Italy (18-19/11/2016)*, oral presentation p 9.
- C70. Tassinari M., Perrone R., Frasson I., Lago S., Scalabrin M., Butovskaya E., Nadai M., Richter SN. Identification and characterization of new selective anti-HIV-1 compounds targeting G-quadruplexes in the LTR promoter region. *Abstract Book of the 4th Italian experience in biomedical research: young minds at work, Desenzano del Garda, Italy (18-19/11/2016)*, oral presentation p.8
- C71. Callegaro S., Perrone R., Scalabrin M., Freccero M., Richter SN. G-quadruplex mediated anti HSV-1 activity of a Core- Extended Naphthalene Diimide compound. *Abstract Book of the 4th Italian experience in biomedical research: young minds at work, Desenzano del Garda (19-19/11/2016)*. **oral presentation**, p 8
- C72. Frasson I., Lavezzo E., Perrone R., Callegaro S., Scalabrin M., Richter SN. G-quadruplex presence, conservation and location in all human viruses; a close-up on retroviruses and herpes viruses. *Abstract Book of the 6th International Meeting on Quadruplex Nucleic Acids, Prague, Czech Republic (31/05-03/06/2017)*, **oral presentation** L34 page 56
- C73. Nadai M., Doria F., Perrone R., Zuffo M., Freccero M., Richter S.N. A red-NIR fluorescent dye detecting nuclear DNA G-quadruplexes: in vitro analysis and cell imaging. *Abstract Book of the 6th International Meeting on Quadruplex Nucleic Acids, Prague, Czech Republic (31/05-03/06/2017)*, poster P117
- C74. Scalabrin M., Tassinari M., Richter SN. Affinity selection mass spectrometry screening of small molecules libraries for the binding to viral G-quadruplexes. *Abstract Book of the 6th International Meeting on Quadruplex Nucleic Acids, Prague, Czech Republic (31/05-03/06/2017)*, poster P152
- C75. Lago S., Rossetto M., Richter SN. A new protocol for kinetic analysis of 1H6 monoclonal antibody and G-quadruplex nucleic acids using surface plasmon resonance biosensing. *Abstract Book of the 6th International Meeting on Quadruplex Nucleic Acids, Prague, Czech Republic (31/05-03/06/2017)*, poster P022-223
- C76. Zuffo M., Tassinari M., Montalvo Sevilla AC., Pirota V., Doria F., Nadai M., Scalabrin M., Richter SN., Freccero M. NDI-PNA conjugates targeting G4 structures within HIV-1 LTR promoter. *Abstract*

- Book of the 6th International Meeting on Quadruplex Nucleic Acids, Prague, Czech Republic (31/05-03/06/2017)*, poster P129
- C77. Nadai M., Tassinari M., Frasson I., Lago S., Perrone R., Tosoni E., Scalabrin M., Butovskaya E., Doria F., Ruggiero E., Phan A.T., Fabris D., Freccero M., Richter SN., Palù G. Presence, function and targeting of G-quadruplexes in the HIV-1 LTR promoter. *Abstract Book of the Congresso Nazionale SIV-ISV, Milan, Italy (28/06/2017)*, **oral presentation O37**
- C78. Callegaro S., Perrone R., Scalabrin M., Doria F., Palù G., Richter SN., A core extended naphthalene diimide G- quadruplex ligand potently inhibits herpes simplex virus 1 replication. *Abstract Book of the Congresso Nazionale SIV- ISV, Milano, Italy (25-28/06/2017)*, poster 060, p 60
- C79. Richter SN., Sciro M., Vanuzzo MC., Narne E., Rossi L., Palù G. Surveillance and containment of *Legionella pneumophila* in water plumbing systems of the hospital of Padua, Italy. *Abstract Book of the 9th International conference on Legionella Rome, Italy (26-30/09/2017)*, poster 49 poster session 3.

Invited lectures:

11. Richter S. (1998) Nuove forme di terapia contro l'HIV: ribozimi e RNA antisense. *Dipartimento di Scienze Farmaceutiche, Università di Padova. (18/12/1998)*
12. Richter S. (2002) Clerocidin: a new tool to dissect nucleic acid structure at protein-DNA Interfaces? *Department of Chemistry and Biochemistry, University of Maryland, Baltimora, USA. (02/04/2002)*
13. Richter SN (2015) G-quadruplexes in viruses: presence, function and targeting Department of Medical Biochemistry and Biophysics, Umeå University, Umeå, Sweden. (22/09/2015)
14. Richter SN. (2016) Role of G-quadruplex in viral replication and transcription, DMM Scientific Meeting, *Department of Molecular Medicine, University of Padova (26-27/05/2016)*
15. Richter SN. (2017) Presence, Function and Targeting of G-quadruplexes in Viral Genomes, *Gordon Research Conference on Nucleosides, Nucleotides, and Oligonucleotides, Salve Regina University, Newport RI USA (25-30/06/2017)*