

ELENCO DELLE PUBBLICAZIONI - LIST OF PUBLICATIONS

Dr. Solomon NERGADZE

Articoli completi su riviste internazionali con sistema peer review presenti in PubMed (NCBI)

Full papers in peer reviewed journals

1. Cerutti F, Gamba R, Mazzagatti A, Piras FM, Cappelletti E, Belloni E, **Nergadze SG**, Raimondi E, Giulotto E. (2016) The major horse satellite DNA family is associated with centromere competence. *Mol Cytogenet.* 9:35. doi: 10.1186/s13039-016-0242-z. IF: 2.140
2. Parolini M, Romano A, Khoraiuli L, Nergadze SG, Caprioli M, Rubolini D, Santagostino M, Saino N and Giulotto E. (2015) Early-life telomere dynamics differ between the sexes and predict growth in the barn swallow (*Hirundo rustica*). *PLoS One* 10(11):e0142530. doi: 10.1371/journal.pone.0142530. eCollection 2015 IF: 3.234
3. Santagostino M†, Khoraiuli L†, Gamba R†, Bonuglia M, Klipstein O, Piras FM, Vella F, Russo A, Badiale C, Mazzagatti A, Raimondi E, Nergadze SG*, Giulotto E*. Genome-wide evolutionary and functional analysis of the Equine Repetitive Element 1: an insertion in the myostatin promoter affects gene expression. *BMC Genet.* 2015 Oct 26;16:126. doi: 10.1186/s12863-015-0281-1. IF: 2.397 (†, Equal contributors; *, corresponding authors)
4. Purgato S, Belloni E, Francesca M, Piras FM, Zoli M, Badiale C, Cerutti F, Mazzagatti A, Perini G, Della Valle G, Nergadze SG, Sullivan KF, Raimondi E, Rocchi M, Giulotto E. (2015) Centromere Sliding on a Mammalian Chromosome. *Chromosoma* 124(2):277-287. doi: 10.1007/s00412-014-0493-6. Epub 2014 Nov 21, PMID: 25432774 Codice ISI: 000355146500012, Codice SCOPUS: 2-s2.0-84929956603 IF: 3.26
5. Nergadze S, Belloni E, Piras F, Khoraiuli L, Mazzagatti A, Vella F, Mirella B, Vitelli V, Giulotto E, Raimondi E. (2014) Discovery and comparative analysis of a novel satellite, EC137, in horses and other equids. *Cytogenet Genome Res* 144(2):114-123. Published online: 21 Oct. 2014, <http://www.karger.com/DOI/10.1159/000368138>; DOI: 10.1159/000368138, PMID: 25342230, Codice ISI: 000346119000005, Codice SCOPUS: 2-s2.0-84908191147 IF: 1.905
6. Vitelli V, Falvo P, Khoraiuli L, Smirnova A, Gamba R, Santagostino M, Nergadze SG, Giulotto E (2013) More on the lack of correlation between TERRA expression and telomere length. *Front. Oncol.* 3:245, Published online: 18 Sept. 2013. DOI: 10.3389/fonc.2013.00245, PMID: 24066279, Codice SCOPUS: 2-s2.0-84891135999 (*Front Oncol.* is published from 2011).
7. Smirnova A, Gamba R, Khoraiuli L, Vitelli V, Nergadze SG*, Giulotto E*. (2013) TERRA Expression Levels Do Not Correlate with Telomere Length and Radiation Sensitivity in Human Cancer Cell Lines. *Front. Oncol.* 3:115. Published online: 18 Sept. 2013. DOI: 10.3389/fonc.2013.00115, PMID: 23717814. ISSN: 2234-943X. (*, corresponding authors) Codice SCOPUS: 2-s2.0-84891074830 (*Front Oncol.* is published from 2011).
8. Vidale P, Magnani E, Nergadze SG, Santagostino M, Cristofari G, Smirnova A, Chiara Mondello M, Giulotto E. (2012) The catalytic and the RNA subunits of human telomerase are required to immortalize equid primary fibroblasts. *Chromosoma* 121:475–488. Published online: 14 July, 2012, DOI: 10.1007/s00412-012-0379-4, PMID: 22797876, Codice ISI: 000308819600004 Codice SCOPUS: 2-s2.0-84867658125, IF: 3.26
9. Achilli A, Olivieri A, Soares P, Lancioni H, Hooshiar Kashani B, Perego UA, Nergadze SG, Carossa V, Santagostino M, Capomaccio S, Felicetti M, Al-Achkar W, Penedo MCT, Verini-Supplizi A, Houshmand M, Woodward SR, Semino O, Silvestrelli M, Giulotto E, Pereira L, Bandelt H-J, Torroni A. (2012) Mitochondrial Genomes from Modern Horses Reveal the Major Haplogroups that Underwent Domestication. *Proc Natl Acad Sci U S A.* 109:2449-2454. DOI: 10.1073/pnas.1111637109, PMID: 22308342, Codice ISI: 000300489200060 Codice SCOPUS: 2-s2.0-84857124895, IF: 9.809
10. Vidale P, Piras FM, Nergadze SG, Bertoni L, Verini-Supplizi A, Adelson D, Guérin G, Giulotto E. (2011) Chromosomal assignment of six genes (EIF4G3, HSP90, RBBP6, IL8,

- TERT, and TERC) in four species of the genus *Equus*. *Anim Biotechnol.* 22(3):119-123. DOI: 10.1080/10495398.2011.575300, PMID: 21774619, Codice ISI: 000295400700001 Codice SCOPUS: 2-s2.0-79960755479, IF: 0.636
11. Raimondi E, Piras FM, Nergadze SG, Di Meo GP, Ruiz-Herrera A, Ponsà M, Ianuzzi L, Giulotto E. (2011) Polymorphic organization of constitutive heterochromatin in *Equus asinus* (2n = 62) chromosome 1. *Hereditas* 148(3):110-113. DOI: 10.1111/j.1601-5223.2011.02218.x, PMID: 21756256, Codice ISI: 000292743000005 Codice SCOPUS: 2-s2.0-79960363443, IF: 0.756
 12. Ruiz-Herrera A, Smirnova A, Khorjiauli L, Nergadze SG, Chiara Mondello C, Giulotto E. (2011) Gene amplification in human cells knocked down for RAD54. *Genome Integrity* 2:5. DOI: 10.1186/2041-9414-2-5, PMID: 21418575, Codice SCOPUS: 2-s2.0-84861800897
 13. Nergadze SG, Lupotto M, Pellanda P, Santagostino M, Vitelli V, Giulotto E. (2010) Mitochondrial DNA insertions in the nuclear horse genome. *Animal Genetics* (Invited submission, special issue of *Animal Genetics*) 41 Suppl 2:176-85. DOI: 10.1111/j.1365-2052.2010.02130.x, PMID: 21070293, ISSN: 0268-9146, Codice ISI: 000284117700026 Codice SCOPUS: 2-s2.0-78449284241, IF: 2.21
 14. Piras FM*, Nergadze SG*, Magnani E, Bertoni L, Attolini C, Khorjiauli L, Raimondi E, Giulotto E. (2010) Uncoupling of Satellite DNA and Centromeric Function in the Genus *Equus*. *PLoS Genet* 6: e1000845. (*, These authors contributed equally to this work). DOI: 10.1371/journal.pgen.1000845, PMID: 20169180, ISSN: 1553-7390, Codice ISI: 000275262700025 Codice SCOPUS: 2-s2.0-77649206825, IF: 8.167
 15. Nergadze SG, Farnung BO, Wischniewski H, Khorjiauli L, Vitelli V, Chawla R, Giulotto E, Azzalin CM. (2009) CpG-island promoters drive transcription of human telomeric repeat-containing RNA. *RNA* 15: 2186-2194. DOI: 10.1261/rna.1748309, PMID: 19850908, ISSN: 1355-8382, Codice ISI: 000272169000010 Codice SCOPUS: 2-s2.0-73249117060, IF: 4.622
 16. Wade CM, Giulotto E, Sigurdsson S, Zoli M, Gnerre S, Imsland F, Lear TL, Adelson DL, Bailey E, Bellone RR, Blöcker H, Distl O, Edgar RC, Garber M, Leeb T, Mauceli E, MacLeod JN, Penedo MCT, Raison JM, Sharpe T, Vogel J, Andersson L, Antczak DF, Biagi T, Binns MM, Chowdhary BP, Coleman SJ, Della Valle G, Fryc S, Guérin G, Hasegawa T, Hill EW, Jurka J, Kiiialainen A, Lindgren G, Liu J, Magnani E, Mickelson JR, Murray J, Nergadze SG, Onofrio R, Pedroni S, Piras MF, Raudsepp T, Rocchi M, Røed KH, Ryder OA, Searle S, Skow L, Swinburne JE, Syvänen AC, Tozaki T, Valberg SJ, Vaudin M, White JR, Zody MC, Broad Institute Genome Sequencing Platform, Broad Institute Whole Genome Assembly Team, Lander ES, and Lindblad-Toh K. (2009) Genome sequence, comparative analysis and population genetics of the domestic horse (*Equus caballus*). *Science* 326: 865-867. DOI: 10.1126/science.1178158, PMID: 19892987, ISSN: 0036-8075, Codice ISI: 000271468000047 Codice SCOPUS: 2-s2.0-70449379045, IF: 31.477
 17. Piras M, Nergadze SG, Poletto V, Cerutti F, Ryder OA, Leeb T, Raimondi E, Giulotto E. (2009) Phylogeny of horse chromosome 5 in the genus *Equus* and centromere repositioning. *Cytogenet Genome Res* 126: 165-172. DOI: [10.1159/000245916](https://doi.org/10.1159/000245916), PMID: 20016166, ISSN:1424-8581, Codice ISI: 000272605100016 Codice SCOPUS: 2-s2.0-73349139245, IF: 1.905
 18. Rebuzzini P, Castiglia R, Nergadze SG, Mitsainas G, Munclinger P, Zuccotti M, Capanna E, Redi CA, Garagna S. (2009) Quantitative variation of LINE-1 sequences in five species and three subspecies of the subgenus *Mus* and in five Robertsonian races of *Mus musculus domesticus*. *Chromosome Res* 17: 65-76. DOI: [10.1007/s10577-008-9004-z](https://doi.org/10.1007/s10577-008-9004-z), PMID: 19184476, ISSN: 0967-3849, Codice ISI: 000264175000006 Codice SCOPUS: 2-s2.0-62549099012, IF: 2.688
 19. Salzano A, Kochiashvili N, Nergadze SG, Khorjiauli L, Smirnova A, Ruiz-Herrera A, Mondello C, Giulotto E. (2009). Enhanced gene amplification in human cells knocked down for DNA-PKcs. *DNA Repair* 8: 19-28. DOI: 10.1016/j.dnarep.2008.08.015. PMID: 18832050;

Epub 2008 Oct 21. ISSN: 1568-7864, Codice ISI: 000262057500004 Codice SCOPUS: 2-s2.0-56549095215, IF: 3.362

20. Ruiz-Herrera A, Nergadze SG, Santagostino M, Giulotto E. (2008) Telomeric repeats far from the ends: mechanisms of origin and role in evolution. *Cytogenet Genome Res* 122: 219-228. DOI: 10.1159/000167807. PMID: 19188690; ISSN: 1424-8581, Codice ISI: 000263130300005 Codice SCOPUS: 2-s2.0-59649117092, IF: 1.905
21. Nergadze SG, Santagostino M, Salzano A, Mondello C, Giulotto E. (2007) Contribution of telomerase RNA retrotranscription to DNA double-strand break repair during mammalian genome evolution. *Genome Biol* 8: R260. DOI: 10.1186/gb-2007-8-12-r260. PMID: 18067655 ; ISSN:1474-760X, Codice ISI: 000253451800008 Codice SCOPUS: 2-s2.0-40449109731, IF: 10.465
22. Carbone L, Nergadze SG, Magnani E, Miscio D., Cardone MF, Roberto R, Bertoni L, Attolini C, Piras MF, de Jong P, Raudsepp T, Chowdhary BP, Guérin G, Archidiacono N, Rocchi M, Giulotto E. (2006) Evolutionary movement of centromeres in horse, donkey, and zebra. *Genomics* 87: 777-782. DOI: 10.1016/j.ygeno.2005.11.012. PMID: 16413164; ISSN: 0888-7543, Codice ISI: 000238168400010 Codice SCOPUS: 2-s2.0-33646839266, IF: 2.793
23. Nergadze SG, Magnani E, Attolini C, Bertoni L, Adelson DL, Cappelli K, Verini Supplizi A, Giulotto E. (2006) Assignment of the *Equus caballus* interleukin 8 gene (IL8) to chromosome 3q14.2→q14.3 by in situ hybridization. *Cytogenet Genome Res* 112: 341B. DOI: 10.1159/000089892. PMID: 16484794; ISSN: 1424-8581, Codice ISI: 000235309300027 Codice SCOPUS: 2-s2.0-32944469822, IF: 1.905
24. Nergadze SG, Rocchi M, Azzalin CM, Mondello C, Giulotto E. (2004) Insertion of Telomeric Repeats at Intrachromosomal Break Sites During Primate Evolution. *Genome Res* 14: 1704-1710. DOI: 10.1101/gr.2778904. PMID: 15310657; ISSN: 1088-9051, Codice ISI: 000223675900004 Codice SCOPUS: 2-s2.0-4644329310, IF: 13.852
25. Azzalin CM, Nergadze SG, Giulotto E. (2001) Human intrachromosomal telomeric-like repeats: sequence organization and mechanisms of origin. *Chromosoma* 110:75-82. DOI: 10.1007/s004120100135. PMID: 11453557; ISSN: 0009-5915, Codice ISI: 000169207900002 Codice SCOPUS: 2-s2.0-0034994404, IF: 3.26
26. Barenfeld LS, Nergadze SG, Mikhelson VM. (2001) [Decreased frequency of activation of replicon clusters in Down syndrome lymphocytes]. *Tsitologiya* 43:692-697. PMID: 11552652; ISSN: 0041-3771, Codice SCOPUS: 2-s2.0-0035236544, IF:
27. Barenfeld LS, Nergadze SG, Pleskach N, Prokofjeva V, Mikhelson VM. (1998) Decreased number of simultaneously operating adjacent clusters of replicons in some human strains with and without X-irradiation. *Mutat Res* 408:219-226. PMID: 9806420; ISSN: 0027-5107, Codice ISI: 000076033900006 Codice SCOPUS: 2-s2.0-0031665878, IF: 4.44
28. Bertoni L, Zoli W, Mucciolo E, Ricotti L, Nergadze SG, Amadori D, Giulotto E. (1998) Different genome organization in two new cell lines established from human gastric carcinoma. *Cancer Genet Cytogenet* 105: 152-159. PMID: 9723033; ISSN:0165-4608, Codice ISI: 000075452600011 Codice SCOPUS: 2-s2.0-0032171292, IF: 1.905
29. Barenfel'd LS, Nergadze SG, Pleskach N, Mikhel'son VM. (1997) [The mechanism of radioresistant DNA synthesis in ataxia-telangiectasia]. *Tsitologiya* 39:20-24. PMID: 9173623; ISSN: 0041-3771, Codice SCOPUS: 2-s2.0-0030633346
30. Barenfeld LS, Nergadze SG, Pleskach N, Mikhelson VM. (1995) Slower synthesis of individual replicons and adjacent replicon clusters in a radiosensitive xeroderma pigmentosum strain with and without X-irradiation. *Int J Radiat Biol* 68:169-76. PMID: 7658142; ISSN:0955-3002, Codice ISI: A1995RT77900007 Codice SCOPUS: 2-s2.0-0029145289, IF: 1.837
31. Barenfel'd LS, Nergadze SG, Pleskach N, Mikhel'son VM. (1995) [The retardation of DNA synthesis in adjacent replicon clusters in the lymphocytes of patients with Down's syndrome as a model of premature aging]. *Tsitologiya* 37:900-904. PMID: 8815603; ISSN: 0041-3771, Codice SCOPUS: 2-s2.0-0029443240

32. Barenfel'd LS, Nergadze SG, Pleskach N, Mikhel'son VM. (1994) [The relation of the characteristics of DNA replication to cell sensitivity to ionizing radiation in xeroderma pigmentosum in form II (XP2CP)]. *Tsitologiya*, 36: 680-686. PMID: 7900208; ISSN: 0041-3771, Codice SCOPUS: 2-s2.0-0028713198
33. Nergadze SG, Pleskach N, Mikhel'son VM, Prokof'eva V, Barenfel'd LS. (1993) [DNA replication in intact and X-ray-irradiated cells in the Cockayne syndrome]. *Tsitologiya* 35:24-29. PMID: 8266580; ISSN: 0041-3771, Codice SCOPUS: 2-s2.0-0027712685
34. Barenfel'd LS, Nergadze SG, Pleskach N, Mikhel'son VM. (1992) [The interrelation between changes in the structural organization of replicon clusters, a retarded fork displacement rate and the high level of spontaneous SCEs in form II of xeroderma pigmentosum]. *Tsitologiya* 34:88-94. PMID: 1455562; ISSN: 0041-3771 Codice ISI: A1992JX40100012 Codice SCOPUS: 2-s2.0-0027016472
35. Khachapuridze GG, Nergadze SG, Lapiashvili N, Panieva I, Barenfel'd LS, Pleskach N, Imedadze MSh. (1991) [The effect of staphylococcal alpha-toxin on DNA replication in human cells]. *Tsitologiya* 33:82-89. PMID: 1821501; ISSN: 0041-3771, Codice ISI: A1991HJ69700012 Codice SCOPUS: 2-s2.0-0026308253
36. Barenfel'd LS, Nergadze SG, Andreeva LF, Pleskach N. (1989) [The action of ionizing radiation on DNA replication in the cells of a healthy human subject and of a patient with Down's syndrome]. *Tsitologiya* 31:1377-1384. PMID: 2534004; ISSN: 0041-3771 Codice ISI: A1989CF63500013 Codice SCOPUS: 2-s2.0-0024835234
37. Barenfeld LS, Nergadze SG, Pleskach N, Mikhel'son VM, Andreeva LF, Bil'din NV. (1989) [Alteration in DNA replication in irradiated basal cell nevus syndrome fibroblasts and effect of ionizing radiation]. *Tsitologiya* 31:775-784. PMID: 2815337; ISSN: 0041-3771, Codice ISI: A1989AN69600007 Codice SCOPUS: 2-s2.0-0024357071
38. Nergadze SG, Khachapuridze GG, Kacharava T, Imedadze MSh, Tsintsadze MA. (1988) [Changes in the cytogenetic indices in the bone marrow cells of white rats undergoing mechanical trauma of various degrees of severity]. *Tsitologiya* 30:495-498. PMID: 3413834; ISSN: 0041-3771, Codice ISI: A1988N309000019 Codice SCOPUS: 2-s2.0-0023987694

Contributo in volume

Beldishevski M, **Nergadze SG**, Khachapuridze GG, Brelidze ZL. (1992) Image processing automation of fibre autoradiograms. In: "MEDINFO 92", K.G.LuN, P.Degoulet, T. Piemme, O. reinhoff (eds), Amsterdam, North-Holland, p. 818-820.