

VEERLE VANACKER – CURRICULUM VITAE (JUNE 2010)
VEERLE.VANACKER@UCLOUVAIN.BE

DEPARTMENT OF GEOGRAPHY
UNIVERSITY OF LOUVAIN
TEL: +32 10 47 85 06

PERSONAL INFORMATION

1. Born: November 1976, Leuven, Belgium
2. Citizenship: Belgian
3. Residence: Gottignystraat 4/ 3, 3001 Heverlee, Belgium

RESEARCH INTERESTS

Geomorphology, Fluvial morphology, Erosion processes, Land use/ -cover change, ¹⁰Be denudation rates, Landscape evolution, Human Impact, Remote Sensing

EDUCATION

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|------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 1996 | B.Sc., Geography, KULeuven, Belgium (Magna cum Laude) |
| 1998 | M.Sc., Physical Geography, KULeuven, Belgium (Magna cum Laude)
Thesis: Modelling of location behaviour of Mesolithic people in NorthEast Belgium.
Supervisor: G. Govers, P. Van Peer |
| 2002 | Postgraduate Advanced Study Course MODLUC, University of Louvain, Belgium |
| 2002 | Ph.D., Geomorphology, KULeuven, Belgium
Thesis: Geomorphic response to human-induced environmental change in tropical mountain areas; Supervisor: G. Govers, J. Poesen |
| 2006 | CRONUS-EU Summerschool, Harkany, Hungary on 'Cosmic ray nuclide systematics on Earth' |

PROFESSIONAL EXPERIENCE

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|-------------|--------------------------------------------------------------------------------------------------------------------------------------------------|
| 2006 - now | Assistant Professor in Geomorphology,
Department of Geography, University of Louvain , Belgium |
| 2005 - 2009 | Senior Research Assistant,
Fonds de la Recherche Scientifique -FNRS |
| 2003 - 2005 | Marie Curie EU Postdoctoral Fellow
University of Hannover , Germany (F. von Blanckenburg); ETH-Zurich (P.W. Kubik) |
| 2002 - 2003 | Postdoctoral Researcher, Department of Geography, University of Louvain , Belgium
4. Laboratory for GIS and Remote Sensing (E. Lambin) |
| 1998 - 2002 | Doctoral Fellow, Research Foundation Flanders - FWO
5. Promoters: G. Govers; J. Poesen |

STUDY VISITS

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|------------|---------------------------------------------------------------------------------------------------------------------|
| Spring '06 | Dartmouth College, US (A. Heimsath)
Massachusetts Institute of Technology (MIT), US (K.W. Whipple) |
|------------|---------------------------------------------------------------------------------------------------------------------|
- Field work and sampling campaign in Ecuador (Jan-June '99, Nov'99 –April'00, June-Dec'00, June-Oct'01, Dec'02, Feb-May'04, Feb-March'05), Egypt (Feb'04, Nov'05), Ethiopia (Feb'06, Sept'06), France (May'98), Kenya (Nov'04), Peru (August '01), Spain (May'97, Dec'07, Feb'10), Sri Lanka (March'04), Sudan (July'05), Swiss Alps (July'05), Tanzania (Dec'03), Turkey (August '97, July '98, June '00), and Vietnam (April'10).

AWARDS, GRANTS AND HONORS

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|------|-------------------------------------------------------------------------------------------------|
| 1998 | British Council , Scholarship for Postgraduate study, University of Edinburgh (declined) |
| 1998 | FWO Research Foundation Flanders – Ph.D. Scholarship (4 yrs) |
| 2000 | Research Foundation – Travel Grant for attending international conference in Slovakia |
| 2002 | Academische Stichting Leuven – Travel Grant for attending international conference |
| 2003 | EU 5th Framework , Marie Curie Individual Postdoctoral Fellowship (2 yrs) |

- 2005 **FRS Fonds de la Recherche Scientifique**, Postdoctoral Fellowship (3 yrs)
 2005 **EU 6th Framework**, Marie Curie Re-Integration Grant
- 2000 **Flemish Association of Geographers (VLA)**, Outstanding Graduate Student Award, 2000
 2003 **Belgian Directorate-General for Development Cooperation**, Development Cooperation Prize for scientific work of high relevance for development co-operation
- 2007 **Research Highlight in *Nature*** (paper by Vanacker et al (2007), "Restoring dense vegetation can slow mountain erosion to near natural benchmark levels", *Geology* 35(4): 303-306).
- 2008 **Member of the 'Académie Royale des Sciences, des Lettres et des Beaux Arts de Belgique'**. Comité National de Pedologie
- 2008 **Invited speaker 'Myres : Meeting of Young Researchers in Earth Sciences'**. New Orleans, May 2008.

INTERNATIONAL PEER-REVIEWED PUBLICATIONS

Published (in chronological order)

1. Vanacker, V., Govers, G., Tacuri, E., Poesen, J., Dercon, G., Cisneros, F., 2000. Using sequential aerial photographs to detect land use changes in the Austro Ecuatoriano, **Revue de Géographie Alpine** 3: 65-75.
2. Vanacker, V., Govers, G., Van Peer, P., Verbeek, C., Desmet, J., Reyniers, J., 2001. Using Monte Carlo simulation for the environmental analysis of small archaeological datasets, with the Mesolithic in Northeast Belgium as a case-study. **Journal of Archaeological Science** 28: 661-669.
3. Vanacker, V., Vanderschaeghe, M., Govers, G., Willems, E., Poesen, J., Deckers, J., De Bievre, B., 2003. Linking hydrological, infinite slope stability and land use change models through GIS for assessing the impact of deforestation on landslide susceptibility in High Andean watersheds. **Geomorphology** 52: 299-315.
4. Vanacker, V., Govers, G., Barros, S., Poesen, J., Deckers, J., 2003. The effect of short-term socio-economic and demographic changes on landuse dynamics and its corresponding geomorphic response with relation to water erosion in a tropical mountainous catchment, Ecuador, **Landscape Ecology** 18: 1-15.
5. Vanacker, V., Govers, G., Poesen, J., Deckers, J., Dercon, G., Loaiza, G., 2003. The impact of environmental change on the intensity and spatial pattern of water erosion in a semi-arid mountainous environment, **Catena** 51: 329 - 347.
6. Bakker, M., Govers, G., Kosmas, C., Vanacker, V., van Oost, K., and Rounsevell, M., 2005. Soil erosion as driver of land use change. **Agriculture, Ecosystems and Environment** 105: 467-481. DOI:10.1016/j.agee.2004.07.009
7. Van Den Eeckhout, M., Poesen, J., Verstraeten, G., Vanacker, V., Moeyersons, J., Nyssen, J., van Beek, L.P.H., 2005. The effectiveness of hillshade maps and expert knowledge in mapping old deep-seated landslides. **Geomorphology**, 67: 351-363. DOI:10.1016/j.geomorph.2004.11.001
8. Vanacker, V., Molina, A., Govers, G., Van Esch, L., Poesen, J., Dercon, G. And Deckers, J., 2005. River channel response to short-term human-induced change in landscape connectivity in Andean ecosystems. **Geomorphology**, 72: 340-353. DOI:10.1016/j.geomorph.2005.05.013
9. Vanacker, V., Linderman, M., Lupo, F., Lambin, E.F., Flasse, S., 2005. Interpretation of global vegetation dynamics by analysing change in vegetation index data in response to inter- and intra-annual climate fluctuations. **Global Ecology and Biogeography** 14: 123- 135.
10. Vanacker, V., von Blanckenburg, F., Hewawasam, T., Kubik, P.W., 2007. Geomorphic development of the Sri Lanka Central Highlands. **Earth and Planetary Science Letters** 253: 402-414. DOI:10.1016/j.epsl.2006.11.003
11. Van Den Eeckhout, M., Poesen, J., Verstraeten, G., Vanacker, V., Moeyersons, J., Nyssen, J., van Beek, L.P.H., Vandekerckhove, L., 2007. Use of LIDAR-derived images for mapping old landslides under forest. **Earth Surface Processes and Landforms** 32: 754-769. DOI: 10.1002/ esp.1417

12. Vanacker, V, Govers, G., 2007 Editorial: Introduction to Land Use Change and Geomorphic, Soil and Water Processes in Tropical Mountain Areas. **Geomorphology** 87: 1-3.
DOI:10.1016/j.geomorph.2006.06.038
 13. Vanacker, V., Govers, G., Molina, A., Poesen, J., Deckers, J., 2007. Spatial variation of suspended sediment concentration in a tropical Andean river system: the Paute River, southern Ecuador. **Geomorphology** 87: 53-67. DOI:10.1016/j.geomorph.2006.06.042
 14. Vanacker, V., von Blanckenburg, F., Govers, G., Molina, A., Poesen, J., Deckers, J., Kubik, P., 2007. Restoring natural vegetation reverts mountain erosion to natural levels. **Geology** 35: 303-306. DOI: 10.1130/G23109A
 15. Lupo, F., Linderman, M., Vanacker, V., Bartholome, E., and Lambin, E., 2007. Categorization of land-cover change processes based on phenological indicators extracted from time series of vegetation index data. **International Journal of Remote Sensing** 28: 2469-2483. DOI: 10.1080/01431160600921943
 16. Molina, A., Govers, G., Vanacker, V., Poesen, J., Zeelmaekers, E., and Cisneros, F., 2007. Impact of vegetation on runoff generation on mountain slopes. **Catena** 71: 357-370.
DOI:10.1016/j.catena.2007.04.002 (I.F. 07: 1.346)
 17. Vanacker V, von Blanckenburg F, Govers G and Kubik PW, 2007. Transient landscape evolution following uplift in the Southern Ecuadorian Andes. **Geochimica and Cosmogenica Acta** 71: A1052. (I.F. 07: 3.665)
 18. Molina, A., Govers, G., Poesen, J., Van Hemelryck, H., De Bievre, B., Vanacker, V, 2008. Environmental Variables Controlling Spatial Variation in Sediment Yield in a Central Andean Mountain Area. **Geomorphology** 98: 176-186. DOI:10.1016/j.geomorph.2006.12.025. (I.F. 08: 2.339)
 19. Vandenberghe, J., and Vanacker, V., 2008. Editorial: Towards a system approach in the study of river catchments. **Geomorphology** 98: 173-175. DOI:10.1016/j.geomorph.2007.01.025. (I.F. 08: 2.339)
 20. Norton KP, and Vanacker V, 2009. Effect of terrain smoothing on topographic shielding correction factors for cosmogenic nuclide derived estimates of basin-averaged erosion rates. **Earth Surface Processes and Landforms** 34 : 145-154. DOI : 10.1002/esp.1700. (I.F. 08: 1.716)
 21. Molina A, Govers G, Cisneros F. and Vanacker V , 2009. Effectiveness of vegetation for sediment deposition and storage in gully beds in degraded Andean Environments. **Earth Surface Processes and Landforms** 34, 755-767. DOI: 10.1002/esp.1747. (I.F. 08: 1.716)
 22. Bellin N, van Wesemael B, Meerkerk A, Vanacker V and Gonzalez Barbera G. 2009. The decay of soil and water conservation structures. A case study from south east Spain. **Catena** 76 : 114-121. DOI : 10.1016/j.catena.2008.10.002 (I.F. 08 : 1.874)
 23. Molina A, Govers G, Van den Putte A, Poesen J and Vanacker V. 2009. Assessing the reduction of the hydrological connectivity of gully systems through vegetation restoration: field experiments and numerical modeling. **Hydrology and Earth System Science** 13: 1823-1836. www.hydrol-earth-syst-sci.net/13/1823/2009 (I.F. 08: 2.167)
 24. Bamutaze Y, Tenywa M.M, Majaliwa M.J.G., Bagoora F., Vanacker V, Magunda M., Obando J., and Wasige J.E.,2010. The effect of cropping system and slope gradient on measured and predicted soil water infiltration rates on Mt. Elgon, Eastern Uganda. **Catena** 80: 122-130. doi:10.1016/j.catena.2009.09.006
 25. Reinhardt L, Jerolmack D, Cardinale, BJ, Vanacker V, and Wright J., 2009. Dynamic interactions of life and its landscape : feedbacks at the interface of geomorphology and ecology. **Earth surface processes and Landforms** 35: 78-101. DOI: 10.1002/esp.1912
- In revision
26. Sougnez, N., Van Wesemael, B., and Vanacker, V. (Submitted December 09). Slow Erosion Rates Inferred from Checkdam Sedimentation for Steep, Sparsely Vegetated Mountain Catchments in Southeast Spain. **Catena**
 27. Bellin, N, Vanacker, V., De Baets, S. (Submitted January 2010). Holocene climate evolution, human occupation history, soil erosion and vegetation cover change in southeast Spain. **Quaternary Science Reviews**.
 28. Vanacker, V., von Blanckenburg, F., Govers, G., Molina, A., Kubik, P. (Submitted Feb 2010). Rejuvenation of the Ecuadorian andes characterized by denudation rates, hillslope gradient, and river longitudinal form. **Geology**.

BOOK CHAPTERS

1. Vanacker, V., Govers, G., Van Peer, P., 2001. Environmental control on mesolithic location behaviour in the north-east of Belgium. In: T. Darvill and M. Gojda (Eds.), *One Land, many Landscapes*, British Archaeological reports No. 987, Archaeopress, Oxford.
2. Vanacker, V., due March 2011. Suspended sediment concentration. In: Singh, Vijay P., Singh, Pratap; Haritashya, and Umesh Kumar (Eds.) *Encyclopedia of Snow, Ice and Glaciers*, Springer, ISBN: 978-90-481-2643-9.

PUBLICATIONS IN NON-PEER REVIEWED JOURNALS

1. Vanacker, V., Govers, G., Van Peer, P., 2000. Ruimtelijke modellering van de relatie tussen fysische landschapskenmerken en het Mesolithisch nederzettingsspatroon in de Antwerpse Noorderkempen, *De Aardrijkskunde*, 3: 33-41.
2. Vanacker, V., Govers, G., Tacuri, E., Poesen, J., Dercon, G., Cisneros, F., Deckers, J. 2001. Utilización de fotografías aéreas secuenciales para detectar cambios del uso de la tierra en el Austro Ecuatoriano. *Agua, Suelo, Tecnologías*, 2, pp. 91-102.
3. Vanderschaeghe, M., Vanacker, V., Govers, G., Poesen, J., 2001. Typering en modellering van massatransport in een klein bekken van de Hoge Ecuatoriaanse Andes (Sta. Ana, Cuenca, Ecuador). *De Aardrijkskunde*, 4: 25-35.
4. Vanacker, V., 2004. De kapbijn regeert al eeuwenlang. **Karakter**, Tijdschrift van de Academische Stichting Leuven, 7: 22-24.

CONFERENCE ABSTRACTS INTERNATIONAL CONFERENCES

Published :

- Guns, M. and Vanacker V., 2010. Deforestation of primary forest and its impact on slope stability. Proceedings of international conference : Triggering of Rapid Mass Movements in Steep Terrains - Mechanisms and Risks. April 2010, Monte Verita, Switzerland.
- Bellin, N and Vanacker V., 2010. Holocene climate evolution, human occupation, soil erosion and vegetation cover change in southeast Spain. *Geophysical Research Abstracts*, Vol. 12, EGU2010-3986, 2010.
- Sougnéz N and Vanacker V., 2009. Spatial variability in channel and slope morphology within the Ardennes Massif, and its link with tectonics. Proceedings of Geomorphometry 2009. Zurich, Switzerland, 31 August - 2 September, 2009.
- Norton KP and Vanacker V., 2009. Effect of terrain smoothing on the correction of terrestrial cosmogenic nuclide production rates for skyline shielding. *Geophysical Research Abstracts*, vol. 11, EGU2009-2096-2009.
- Molina A, Govers G and Vanacker V., 2009. Significance of vegetation restoration in gully beds on reducing erosion and sediment transfer in highly degraded Andean environments. *Geophysical Research Abstracts*, vol. 11, EGU2009-7513-2009.
- Vanacker, V.; Govers, G; von Blanckenburg, F; Kubik, PW, 2008. River Longitudinal Profiles as Indicators of Transient Landscape Evolution. 4th Alexander von Humboldt International Conference - The Andes: Challenge for Geosciences. 24-28 november 2008, Santiago de Chili, Chili. Book of abstracts.
- Molina A., Govers G., Vanacker V., 2008. Impact of gully bed revegetation on modifying sediment transport capacity and enhancing sediment storage in degraded mountain catchments. 4th Alexander von Humboldt International Conference - The Andes: Challenge for Geosciences. 24-28 november 2008, Santiago de Chili, Chili. Book of abstracts.
- Vanacker, V.; Govers, G; von Blanckenburg, F; Kubik, PW, 2008. Restoring Dense Vegetation slows Human-accelerated Erosion Rates. 4th Alexander von Humboldt International Conference - The Andes: Challenge for Geosciences. 24-28 november 2008, Santiago de Chili, Chili. Book of abstracts.
- Bellin N, van Wesemael B, Meerkerk A, Vanacker V., and Barbera GG, 2008. The Decay of Soil and Water Conservation Structures in southeast Spain increases Connectivity between the Cropland and the Fluvial System. *Geophysical Research Abstract*, Vol. 10, EGU2008-A-08543, 2008

- Sougnéz N, Vanacker V, and van Wesemael B, 2008. Low Modern Erosion Rates observed in Steep, Sparsely Vegetated Mountain Ranges in southeast Spain *Geophysical Research Abstracts*, Vol. 10, EGU2008-A-08904, 2008.
- Vanacker V, Govers G, von Blanckenburg F, and Kubik PW, 2008. Quantification of the Transient Behaviour of Rivers draining the Southern Ecuadorian Andes. *Geophysical Research Abstracts*, Vol. 10, EGU2008-A-06134, 2008.
- Molina, A; Govers, G; Vanacker, V; Van den putte, A; Smets, T, 2008. Effectiveness of gully bed recolonisation on reducing hydrological connectivity in degraded mountain catchments. *Geophysical Research Abstracts*, Vol. 10, EGU2008-A-02502, 2008.
- Molina A, Govers G, Vanacker V, Poesen J, Zeelmaekers E, Cisneros F, 2007. Role of land use/ -cover in controlling runoff generation on mountain slopes. *Geophysical Research Abstracts*, Vol. 9, 05056, 2007.
- Vanacker, V., Von Blanckenburg, F., Hewawasam, T., and Kubik, P., 2006. TI: Constraining Models of Development of the Sri Lankan Escarpment Using Cosmogenic Nuclide Data on River Sediment. *Eos Trans. A GU*, 87(52), Fall Meet. Suppl., Abstract H13E-1438.
- Vanacker, V. Von Blanckenburg, F., Govers, G., Molina, A., Poesen, J., Deckers, J., and Kubik, P., Using cosmogenic nuclides to assess the geomorphic response to human impact in tropical highlands. In: J.Poesen, J.Deckers, Mitiku Haile, J.Nyssen, and S. Bruneel (Eds.), 2006. *Highland Symposium on environmental change, geomorphic processes, land degradation and rehabilitation in tropical and subtropical highlands*. Mekelle, Ethiopia, 19-25 September 2006. Book of abstracts.
- Von Blanckenburg, F., Vanacker, V., Hewawasam, T., and Kubik, P., 2005. Constraining soil erosion mitigation using cosmogenic nuclides in river sediment. *Eos Trans. A GU*, 86(52), Fall Meet. Suppl., Abstract U32A-06.
- Vanacker, V., Molina, A., Govers, G., Poesen, J., Deckers, S., von Blanckenburg, F., 2005. River channel response to historical land use changes in Andean ecosystems. In: H. Haas, K.Ramseyer, F.Schlunegger (Eds.) *Sediment 2005. Schriftenreihe der Deutschen Gesellschaft für Geowissenschaften. Heft 38*. ISBN: 3-932537-33-5.
- Vanacker, V., Govers, G., Molina, A., Kubik, P., von Blanckenburg, F., 2005. The impact of human-induced environmental change on sediment production, transport and delivery in large mountain catchments. In: H. Haas, K.Ramseyer, F.Schlunegger (Eds.) *Sediment 2005. Schriftenreihe der Deutschen Gesellschaft für Geowissenschaften. Heft 38*. ISBN: 3-932537-33-5.
- Vanacker, V., Govers, G., van Hemelryck, H., Molina, A., Kubik, P., von Blanckenburg, F., 2005. How do Humans Affect Geomorphic Process Rates in Tropical Mountain Areas? *Geophysical Research Abstracts*, Vol. 7, 01821, 2005.
- Govers, G., Vanacker, V., De Bièvre, B., Cisneros, F., Molina, A., Deckers, J., Poesen, J., 2005. Geomorphic response to land use change of tropical mountain areas: can analogies help us in prediction and remediation? *Geophysical Research Abstracts*, Vol. 7, 05646, 2005
- Vanacker, V., Van Hemelryck, H., Pacheco, E., De Bievre, B., Molina, A., Poesen, J., Deckers, S., Govers, G., 2004. Assessing sediment production in degraded areas using gabion infillings. Proceedings of the *Second international symposium on land use change and soil and water processes in tropical mountain environments*, 14-17 December 2004, Luang Phrabang, Lao PDR.
- Linderman, M., Lupo, F., Vanacker, V., Wannebo, A., Serneels, S., Benz, D., Swinnen, E., Rowhani, P., Lambin, E.F., 2004. Analyzing Land Cover/ Land Use Change using Coarse Resolution Imagery. Proceedings of the *Second International SPOT/ VEGE TTON Users Conference*. 24-26 March 2004, Antwerp, Belgium.
- Swinnen, E., Van Speybroek, D., Eerens, H., Veroustraete, F., Lhermitte, S., Nackaerts, K., Verbesselt, J., Coppin, P., Benz, D., Lupo, F., Rowhani, P., Vanacker, V., Wannebo, A., Lambin, E.F., 2004. GLOVEG: Centre of Excellence in Remote Sensing of Terrestrial Ecosystem Dynamics. Proceedings of the *Second International SPOT/ VEGE TTON Users Conference*. 24-26 March 2004, Antwerp, Belgium.
- Lupo, F., Vanacker, V., Linderman, M., Rowhani, P., Lambin, E.F., 2004. Categorization of Land Cover Change processes based on phenological indicators extracted from temporal Vegetation Index Series. Proceedings of the *Second International SPOT/ VEGE TTON Users Conference*. 24-26 March 2004, Antwerp, Belgium.
- Van den Eeckhout M, Poesen J, Verstraeten G, Vanacker V, Moeyersons J, Nyssen J and Van Beek J, 2004. How effective is the use of DEMs and expert knowledge for the mapping of old, deep-seated landslides? *Geophysical Research Abstracts*, Vol. 6, 06722, 2004.
- Vanacker, V., Govers, G., Poesen, J., Deckers, J., 2002. Spatial variation of suspended sediment concentration in a tropical Andean river system: the Río Paute, southern Ecuador. Proceedings of the *International Symposium on Land Use Change and Geomorphic, Soil and Water Processes in Tropical Mountain areas*, 16-23 December 2002.

- Van Rompaey, A., Vanacker, V., Van Esh, L., Van Oost, K., Govers, G., 2002. Changes in landscape connectivity and their impact on river regimes and sediment yield. *International Symposium on Land Use Change and Geomorphic, Soil and Water Processes in Tropical Mountain Areas*, 16-23 December 2002, Quito – Cuenca, Ecuador.
- Govers, G., Vanacker, V., Tacuri, E., Vanderschaege, M., Willems, E., Poesen, J., Deckers, J., 2002. Spatial modelling of the impact of deforestation on landslide susceptibility. *International Symposium on Land Use Change and Geomorphic, Soil and Water Processes in Tropical Mountain Areas*, 16-23 December 2002, Quito – Cuenca, Ecuador.
- Vanacker, V., Barros, S., Govers, G., Poesen, J., Deckers, J. 2001. *The Impact of Globalisation on Land Use Changes and the related Geomorphic Impacts in a Tropical Mountainous Catchment*. In: Proceedings of Global Change Open Science Conference 2001. "Challenges of a Changing Earth", 10 - 13 July 2001, RAI Conference Center, Amsterdam, Netherlands.
- Vanacker, V., Govers, G., Poesen, J., Deckers, J., 2000. *Dynamic modelling of the geomorphic response to land use changes for irrigated lands in a semi-arid mountainous environment*. In: Sury, M. (ed), Proceedings of The International Symposium on Geomorphic Response to Land Use Changes, Smolenice, Slovakia. p. 66.
- Vanacker, V., Govers, G., Louiza, G., Dercon, G., Deckers, J., Poesen, J., 2000. *Influence of land use changes on the intensification of gully erosion in a semi-arid mountainous environment*, International Symposium on Gully Erosion under Global Change, april 2000, Leuven, Belgium.
- Vanacker, V., Govers, G., Van Peer, P. 1999. *Environmental controls on Mesolithic locational behaviour in the north-east of Belgium*. European Association of Archaeologists, 5th annual meeting, 14th-19th September 1999, Bournemouth.

Unpublished

- Balthazar V, Hall J, Hostert P, Lambin E, Vanocckelen S, Vanacker V, Van Rompaey A., 2010. Mapping of the forest transition and its ecosystem impacts in mountain ecosystems (FOMO). *Belgian Earth Observation Day*, Chaudfontaine, May 2010.
- Guns M and Vanacker V, 2010. Deforestation of native primary forest and its impact on slope stability. *PhD day*, Namur, Belgium, January 2010.
- Balthazar V and Vanacker V, 2010. Mapping of indicators for ecosystem services in mountain areas using high and very-high resolution remote sensing data: natural hazard regulation and carbon storage support. *PhD day*, Namur, Belgium, January 2010.
- Vanacker, V., 2009. Menselijke impact op erosieprocessen in berggebieden. *ICG Slotsymposium*, Wageningen University, November 2009. (invited presentation)
- Bellin N and Vanacker V, 2009. Changes in climatic conditions, végétation cover and erosion during the Holocene in Southeast Spain. *Congreso Internacional sobre Desertificación en memoria del Profesor John B. Thomas*. Murcia, Spain, September 2009.
- Vanacker V, 2009 . Humans as Geomorphic Agents. *Geologia Belgica*. Ghent, September 2009.
- Vanacker V, 2007. Compilation of data on assessment of soil degradation in Nile basin countries. *International Workshop of the UNESCO Fit project*, October 2007, Khartoum, Sudan
- Vanacker, V., von Blanckenburg, F., Hewawasam, T., and Kubik, P., 2006. Constraining escarpment erosion and landscape development of the Central Highlands of Sri Lanka. Cronus EU Summerschool 12-17 June 2006, Harkany, Hungary.
- Vanacker V, 2005. Sediment transport modeling in the Nile basin: the way forward. *International Workshop of the UNESCO Fit project*, July 2005, Khartoum, Sudan.
- Ahmed, A.A., El-Sersawy, H., Vanacker, V., Ismail, U.H., 2005. Nile River sediment modeling: challenges and opportunities. *International Conference of the UNESCO FIT project*, November 2005, Sharm el Sjeik, Egypt.
- Golla, S., El-Sersawy, H., Ahmed, A.A., Vanacker, V., 2005. Modelling water and sediment fluxes in steep river channels: Case of Awash basin. *International Conference of the UNESCO FIT project*, November 2005, Sharm el Sjeik, Egypt.
- Mwanuzi, F., and Vanacker, V., 2005. Comparison of two different transport models to predict sediment transport: Simiyu River, Tanzania, as a case study. *International Conference of the UNESCO FIT project*, November 2005, Sharm el Sjeik, Egypt.
- Vanacker V, 2004. Watershed erosion modeling. *International Workshop of the UNESCO Fit project*, November 2004, Nairobi, Kenya.

- Vanacker V, 2004. Identification and monitoring of sources of sediment production. *International Workshop of the UNESCO Fit project*, June 2004, Alexandria, Egypt.
- Vanacker, V., Linderman, M., Lupo, F., Lambin, E., 2003. Validation of land cover change products. *GOF-C-GOLD "Global Land Cover Validation Workshop"*. 27-28 March 2003, Ispra, Italy.
- Vanacker V, 2003. Geomorphic response modeling to land use change. . *International Workshop of the UNESCO Fit project*, December 2003, Dar es Salaam, Tanzania.
- Vanacker V, Tacuri E, Vanderschaege M, Govers G, Poesen J and Deckers J, 2002. Spatial modelling of the impact of deforestation on shallow landslide susceptibility. November 2002, MODLUC EU Course, University of Louvain, Belgium.
- Vanacker, V., Govers, G., Poesen, J., Deckers, J., 2001. *Modelización espacial de la relación entre los cambios ambientales y los procesos geomorfológicos en una cuenca montañosa*. Proceedings of the Workshop "Challenges of integrated mountain watershed management", 21-22 august, Lima, Peru.

THESES

- Vanacker, V., 1998. Spatial modeling of Mesolithic location behaviour in the northeast of Belgium (Ruimtelijke modellering van de relatie tussen fysieke landschapskenmerken en het Mesolithisch nederzettingsspatroon in de Antwerpse Noorderkempen). Unpublished M.Sc. thesis, Faculty of Science, KU Leuven, Belgium.
- Vanacker, V., 2002. *Geomorphic response to short-term human-induced land use changes in tropical mountain areas, Ecuador*. Unpublished Ph.D. thesis, Faculty of Science, KU Leuven, Belgium.

CURRENT AND RECENT FUNDING

- 2010 BSPO, Stereo Programme, Thematic project (2010-2014). Remote sensing of the forest transition and its impact on ecosystem services in mountain ecosystems. Project Partner.
- 2010 BSPO, Bilateral Cooperation Project Belgium-Vietnam (2010-2014). Land use and forest cover change under impact of socio-economic development and its implications on environmental services. Project Leader
- 2010 E.U. 7th Framework – Marie Curie EïF Grant (2010-2012). Effects of land cover change and land abandonment on sediment yield in semi-arid Mediterranean catchments using remote sensing, GIS and field techniques. Investigator: R. Ortega Perez, Promotor: V. Vanacker
- 2009 Commission universitaire pour le développement (CUD-PIC, 2009-2014). Strengthening the scientific and technological capacities to implement spatially integrated land and water management schemes adapted to local socio-economic-cultural and physical settings. Project leader
- 2008 Commission universitaire pour le développement (CUD-PIC, 2008-2012). Improving water resource planning at the scale of micro-dam catchments in Tigray, Northern Ethiopia: learning from success and failure. Project partner
- 2007 University of Louvain, Fonds Spécial de la Recherche (2007-2009). Landscape response to tectonic uplift and climate variability across the Ardenne Massif on a timescale of 10³ to 10⁶ years. Project leader
- 2007 National Science Foundation (FNRS, 2007-2010). Quantification of the impact of historical land use change on the temporal evolution of erosion in southeast Spain during the Holocene, using a novel interdisciplinary approach. Project leader
- 2006 National Science Foundation (FNRS). Quantitative analysis of the effect of human-induced land use/-cover change on the rate and spatial pattern of desertification. Project leader
- 2006 UNESCO-International Hydrological Program. Unesco Flanders Fund in Trust Fund (2006-2010). Flow Regimes from International Experimental and Network Data (FRIEND), Nile Basin. Project Partner.
- 2005 E.U. 6th Framework – Marie Curie ERG Grant (2006). Quantitative analysis of the effect of human-induced land use/-cover change on the rate and spatial pattern of desertification. Project leader
- 2003 E.U. E.U. 5th Framework – Marie Curie Grant (2003-2005). Quantification of the effect of human-induced environmental change on geomorphic activity in tropical mountains. P.I.s: von Blanckenburg, V. Vanacker

- 2003 Flemish Interuniversity Council (2003). VLIR-South Initiative: Participatory Discussion and Experimentation Platform for bridging the gap between academic research and stakeholders. University of Cuenca, Ecuador. Project partner
- 2000 Empresa Publica Municipal de Telecomunicaciones, Agua Potable y Alcantarillado del Canton Cuenca. Dinámica de uso del suelo en la cuenca hidrográfica del río Machángara en los últimos 40 años. Project leader
- 2000 National Science Foundation (FWO). Individual Mobility Allowance for research on land use change and erosion in Ecuadorian Andes. Project leader

INVITED LECTURES AND PRESENTATIONS

- 2009 ICG Slotsymposium. Wageningen University (the Netherlands). Menselijke impact op erosieprocessen in berggebieden. *Invited presentation*
- 2008 Department of Geography and Geology, FUNDP Namur, Belgium. Land use and erosion in tropical mountain regions. *Invited presentation.*
- 2008 Department of Geography, University of Exeter (UK). Topography, land use and denudation rates. *Invited presentation*
- 2008 MYRES 2008, New Orleans, May 2008. Dynamic Interactions of Life and its Landscape. *Invited presentation*
- 2005 Fall AGU 2005, San Francisco, Constraining Soil Erosion Mitigation Using Cosmogenic Nuclides, *Invited presentation (von Blanckenburg).*
- 2005 Department of Geology and Geography, KULeuven, Belgium, *Invited Lecture for A dvance Course on Geomorphology*
- 2005 PE&RC Symposium. Advances in Landslide Research: on-site and off-site effects, *Invited presentation*
- 2004 Department of Soil Sciences, University Hannover, *Invited Lecture*
- 2001 CGIAR-CIP Workshop on Challenges of integrated mountain watershed management, *Invited presentation*
- 2001 Royal Academy for Sciences and Arts of Belgium. Forum 'Cartography, GIS and the third dimension', Subcomité Cartography and GIS, *Invited presentation.*
- 2001 FLAGIS, Flemish Association for Geographical Information Systems, *Invited presentation.*

PROFESSIONAL AFFILIATIONS

- 2000 - Member of CONDESAN, Consorcio para el Desarrollo Sostenible de la Region Andina
- 2001 - Member of the International Association of Geomorphologists
- 2001 - Member of the Academische Stichting Leuven
- 2002 - Member of the Belgian Soil Science Society
- 2002 - Member of the Mountain Research Forum
- 2005 - Member of European Geosciences Union

SERVICES

International Technical Assistance

- 2002 - Flemish counterpart of the FRIEND/ NILE basin project of UNESCO FIT Fund. Component now Sediment Transport and Watershed Management.
- 2005 Technical Expert in Soil Erosion Processes of the EU financed International Project on: Integrated Development of the Paute River Basin. Consejo de Programacion de Obras de Emergencia, Cuenca, Ecuador
- 2003 Technical Expert in Fluvimorphology for the implementation of a new water purification plant in Cuenca by the Empresa Municipal de Telecomunicaciones, Agua Potable y Alcantarillado.

Editorial and Professional Society Service

- 2008 Guest co-Editor of Geomorphology Special Issue on 'Climatic and Human Impact on Soil Erosion and Fluvial Activity' (Geomorphology 2008)
- 2005 Guest co-Editor of Geomorphology Special Issue on 'Land Use Change and Geomorphic, Soil and Water Processes in Tropical Mountain Areas' (Geomorphology 2007)
- 2005 EGU 2005 (European Geosciences Union) Annual Meeting Symposium. Co-Convenor on "How humans affect geomorphological processes?"
- 2002 Field trip leader of the International Conference on Land Use Change and Geomorphic, Soil and Water Processes in Tropical Mountain areas, Ecuador.
- 2002 Member of the international Scientific Committee of the International Symposium on Land Use Change and Geomorphic, Soil and Water Processes in Tropical Mountain areas, Ecuador, 16-23 December 2002.
- 2007 - Member of the Board of the Belgian Soil Science Society
- 2000 - Regular Referee for *Geomorphology*, *Catena*, *Soil Use and Management*, *Landscape Ecology*, *Agriculture, Ecosystems and Environment*, *Applied Geography*, *International Journal of Remote Sensing*, *Geology*, *Earth Surface Processes and Landforms*

Media interest for research

Science and Development Network (www.scidev.net): News, views and information about science, technology and the developing world. April 2007. *'Restore vegetation to slow soil erosion'*, Interview with E. Aguilar

Knack Magazine (April 2007). *Bomen stoppen erosie*

Nature Research Highlights (April 2007, Vol 446, 5 April 2007, p. 586). *Eroding principles*.

NGV-Geonieuws 137 artikel 814. 14 Juni 2007, jaargang 9 nr. 6 artikel 814. *Erosie van tropische gebergten vrijwel tot staan na herbebossing*

GRADUATE STUDENTS

- Nicolas Bellin (PhD UCL Belgium, research assistant : 2006-2012), Quantification of the impact of historical land use change on the temporal evolution of erosion in southeast Spain during the Holocene. Promotor: V. Vanacker, Co-promotor: B. Van Wesemael.
- Nicolas Sougnez (PhD UCL Belgium, research assistant : 2007-2013). Landscape response to tectonic uplift across the Ardenne Massif on a timescale of 10^3 to 10^6 years. Promotor: V. Vanacker, Co-promotor: B. Van Wesemael.
- Marie Guns (PhD UCL Belgium, Fonds de la Recherche Scientifique PhD Grant : 2009-2013). Sediment dynamics in tropical mountain regions : Influence of climatic and anthropogenic disturbances on erosion and sediment transfert mechanisms. Promotor: V. Vanacker, Co-promotor: A. Demoulin (Ulg).
- Hanh Le (PhD UCL Belgium, Belgian Technical Cooperation PhD grant, 2009-2013). Forest cover change under impact of socio-economic development and its implications on environment in Tuyen Quang Province, Vietnam. Promotor: E. Lambin, Co-promotor: V. Vanacker
- Daniel Teka (PhD UCL Belgium, CUD PhD grant, 2009-2013). Water Balance of the Reservoirs and the Integration of the Runoff Response at the Catchment Scale. Promotor: B. van Wesemael, Co-promotor: V. Vanacker, V. Hallet.
- Vincent Balthazar (PhD UCL Belgium, 2010-2014). Indicators for ecosystem services using high and very high resolution remote sensing data: natural hazard regulation and carbon storage support. Promotor: V. Vanacker.

LANGUAGES

Dutch	Mother Tongue
English	Excellent
Spanish	Excellent
French	Good
German	Basic