

Amy Bogaard

Personal details

Full name: Amy Marie Bogaard
Date of birth: March 30, 1972
Nationality: Canadian/US dual
Current posts: Professor of Neolithic and Bronze Age Archaeology
Fellow, St Cross College
Stipendiary lecturer and Director of Studies in Archaeology & Anthropology, St Peter's College
Work address: School of Archaeology
1 South Parks Road
Oxford OX1 3TG
Tel. 01865278281
Email: amy.bogaard@arch.ox.ac.uk

Qualifications

2002 PhD, Department of Archaeology, University of Sheffield
(thesis title: 'The Permanence, Intensity and Seasonality of Neolithic-Bronze Age Crop Cultivation in Central Europe')
1995 MSc in Environmental Archaeology and Palaeoeconomy, Department of Archaeology and Prehistory, University of Sheffield (distinction)
1994 B.A. in Classical and Near Eastern Archaeology with a minor in Ancient Greek, Bryn Mawr College (summa cum laude)

Full-time academic employment

2014- Professor of Neolithic and Bronze Age Archaeology, School of Archaeology, University of Oxford
2007-14 Lecturer in Neolithic and Bronze Age Archaeology, School of Archaeology, University of Oxford
2003-7 Lecturer in Archaeological Science, Department of Archaeology, University of Nottingham

Administrative duties

2019- Head, School of Archaeology
2016-19 Deputy Head, School of Archaeology
2010-17 Secretary for admissions, Archaeology and Anthropology
2008- Coordinator for Honour Moderations Paper 4, 'The Nature of Archaeological Enquiry', School of Archaeology, Oxford
2010-12 Chair, Standing Committee for the undergraduate degree course in Archaeology and Anthropology
2007- Director of Studies in Archaeology and Anthropology, St. Peter's College, Oxford

Major research grants

2019-23 PI of Oxford-based €1.14 million project within €6.4 million European Research Council Synergy grant (No. 810586, 'Exploring the dynamics and causes of prehistoric land use change in the cradle of European farming'), with PIs Hafner and Tinner (Bern) and PI Kotsakis (Thessaloniki)
2019- €212934 Marie Skłodowska-Curie Actions Individual Fellowships (European Commission), *NICHE* (838395), Scientist in Charge; Fellow: Dr Alex Weide
2018- €195455 Marie Skłodowska-Curie Actions Individual Fellowships (European Commission), *MINERVA* (798143), Scientist in Charge; Fellow: Dr Tanya Dzhanfezova

- 2017- €195,455 Marie Skłodowska-Curie Actions Individual Fellowships (European Commission), *CUISINE* (704867), Scientist in Charge; Fellow: Dr Juanjo Garcia-Granero
£5.6K Rust Family Foundation, 'Bio- and geoarchaeological investigations at Knossos Gypsades, Crete' (PI)
- 2014- £100K, Institute of Aegean Prehistory, for excavations and geophysical survey at Knossos-Gypsades, Crete
- 2013-17 €1.2 million European Research Council starter investigator grant (No. 312785), 'The Agricultural Origins of Urban Civilization' (PI)
- 2008 £236K, Irish National Strategic Archaeological Research Programme (No. 16717), 'Cultivating societies: assessing the evidence for agriculture in Neolithic Ireland' (co-I)
- 2007 £65K National Science Foundation (USA) (No. 0647131), 'Economic integration and cultural survival at Neolithic Çatalhöyük, Turkey' (co-PI, with Katheryn Twiss, Stony Brook University, USA)
£446K, Natural Environment Research Council (UK) (NE/E003761/1), 'Crop stable isotope ratios: new approaches to palaeodietary and agricultural reconstruction' (PI; co-Investigators: Michael Charles, Richard Evershed, Tim Heaton, Glynis Jones)

Workshops (co-)organised

- 2020 -Santa Fe Institute Working Group (co-organized with Greger Larson), Re-evaluating the origins and trajectories of domestication
- 2017 -Santa Fe Institute Working Group (co-organized with Tim Kohler), Explaining significant household Gini coefficient disparities between the Old and New Worlds in prehistory
- 2015 -Sault, Provence (with the Chambre d'agriculture), Les plantes adventices: indicateurs des conditions agricoles (NERC Impact Acceleration funding)
-Chefchaouen, Morocco (co-organized with Mohammed Ater): Agrobiodiversity present and past: ecological and archaeological perspectives on traditional farming regimes in Morocco (British Council/CNRST Research Links programme)
- 2014 -Oxford, Crop stable isotope ratios and their agronomic potential (NERC Impact Acceleration funding)

Conference communications/invited lectures – last 5 years

2020

Invited lecture, Dondena research centre on social dynamics and public policy, Bocconi University, Milan, February, 'New insights into prehistoric farming in Europe'

2019

Invited lecture, International Workgroup for Palaeoethnobotany, Lecce, June, '25 years of archaeobotany at Çatalhöyük: what we have learned'

SAA/Albuquerque/Plant isotope symposium, April, 'From present-day fields to ancient samples... and back again: Strategies for establishing principles of interpretation in plant stable isotope work'

Invited lecture, Santa Fe Institute, April, 'Building a long-term perspective on agricultural resilience: Recent work on the Neolithic-Bronze Age in central Turkey'

Invited lecture, Department of Archaeology, University of Newcastle, February, 'Exploring the sociality and ecology of early farming: recent archaeobotanical work at Neolithic Çatalhöyük, central Anatolia'

Invited lecture, McDonald Institute, Department of Archaeology, Cambridge, symposium on grand narratives in archaeology, January, 'Co-evolution of farming, cities and inequality in western Eurasia'

2018

Centre for Urban Network Evolutions, Aarhus University, Denmark, November, 'Archaeobotanical approaches to early urbanism in western Eurasia'

Max Planck Institute-Science of Human History Distinguished Lecture Series, Jena, Germany, November, 'Recent explorations of early urban agroecology in western Eurasia'

Blavatnik School of Government, Challenges of Government symposium, Inequality panel, November, 'The archaeology of inequality over the long term'

Invited lecture, Department of Anthropology, Harvard University, September, 'How early cities of western Eurasia (re-)invented agriculture'

Chris Mee lecture, University of Liverpool, Dept of Archaeology, Classics and Egyptology, May, 'Agriculture around the Aegean: a 'tour' of recent work on Neolithic-Bronze Age farming'

Keynote lecture, conference on Afro-Eurasian Archaeobotany: New perspectives, new approaches workshop, Nara, Japan, January, 'Reconstructing the agroecology of early cities in western Asia and Europe using crop stable isotope analysis and weed ecology'

Invited lecture, Inequality before farming conference, University of Cambridge, McDonald Institute, January, 'The farming-inequality nexus'

Invited lecture, Archaeology Institute of America session on Agriculture in the Prehistoric Aegean, January, 'From speculation to data? Using stable carbon and nitrogen isotope studies to test land use models in the prehistoric Aegean'

Research seminar, University of Cincinnati, Dept of Anthropology, January, 'Of secret stores and garden magic: Recent archaeobotanical work at Neolithic Çatalhöyük, central Anatolia'

Research seminar, University of Cincinnati, Dept of Classics, January, 'Reconstructing Hittite agriculture at Hattusha, central Anatolia'

2017

Invited lecture, World Science Forum (Jordan), CBRL session on Science and Archaeology, November, 'Farming in the deep past, lessons for the future'

Invited lecture series, Shandong University, Dept of Archaeology, October, 'Early farming in western Asia and Europe'

Hall annual lecture, University of Queensland, School of Social Science, May, 'Feeding cities of the past and future: lessons from early urban agroecology in western Eurasia'

Invited lecture, PELOPS conference, Athens, April, 'Characterising land-use in prehistoric Greece and beyond: interdisciplinary approaches to on-site bioarchaeological evidence'

Research seminar, University of York, March, 'Feeding early cities: implications for resilience and social inequality'

Research seminar, British Museum, February, 'Exploring the agroecology of early cities: case studies from western Asia and Europe'

Research seminar, University of Cambridge, January, 'Farming, land and inequality: from Neolithic villages to early cities in western Asia and Europe'

2016

Invited lecture, International Workgroup for Palaeoethnobotany, Paris, June, 'Exploring the role of agriculture in urbanisation: A multi-stranded approach using functional weed ecology and crop stable isotope analysis'

Research seminar, University of Edinburgh, November, 'Exploring the agroecology of early cities in western Eurasia: case studies from the AGRICURB project'

Research seminar, University of Lausanne, November, 'Reconstructing prehistoric farming and its palaeoecological implications in central Europe and beyond'

Keynote lecture, CNRS BioDivMex symposium, SfE Marseille, October, 'The functional ecology of arable weeds: Reconstructing prehistoric farming practices through comparison with present-day "traditional" agrosystems'

Amerind Foundation seminar, September, 'The agroecology of (in)equality: integrating Gini coefficients with recent bioarchaeological work on early urbanization in northern Mesopotamia and south-west Germany'

SAA/Orlando/Household inequality symposium, April, 'The agroecology of inequality: Novel bioarchaeological approaches to early urbanization in western Asia and Europe'

Special lecture, British School at Athens Open Meetings in Athens and Thessaloniki, February, 'From first farmers to first cities in the Aegean (and beyond): New insights into the agricultural origins of urban societies'

2015

Invited lecture, European Archaeologists' Association conference, session titled From farmscapes to isoscapes, September, 'From modern to ancient farming isoscapes: Combining present-day crop isotope and arable weed surveys to reconstruct past agrosystems'

Research seminar, Deutsches Archäologisches Institut, Berlin, October, 'From Çatalhöyük to Hattuşa: Farming practice and plant use over the long term in ancient central Anatolia'

Research seminar, Lund University, September, 'Recent insights into plant use and management at Neolithic Çatalhöyük, central Anatolia'

Research seminar, Aristotle University of Thessaloniki, June, 'From Çatalhöyük to Hattuşa: farming practice and plant use over the long term in ancient central Anatolia'

Invited research paper, Santa Fe Institute, Coevolution of Behaviors and Institutions 2015 meeting, 'The nature and consequences of early farming practice in western Eurasia: case studies in the (gradual) emergence of inequality'

Publications – last 5 years

Books

Outram, A.K. and Bogaard, A. 2019. *Subsistence and Society in Prehistory: New Directions in Economic Archaeology*. Cambridge: Cambridge University Press.

Edited volumes

Bogaard, A. (ed) 2017. *World Archaeology* 49.1, special issue 'The archaeology of food surplus'.

Articles and chapters

2020

García-Granero JJ, Skoula M, Sarpaki A, Cárdenas M, Madella M, Bogaard A (2020) A long-term assessment of the use of *Phoenix theophrasti* Greuter (Cretan date palm): the ethnobotany and archaeobotany of a neglected palm. *Journal of Ethnobiology* 40, 101–114

Hamerow, H., A. Bogaard, M. Charles, E. Forster, M. Holmes, M. McKerracher, S. Neil, C. B. Ramsey, E. Stroud and R. Thomas, 2020. An integrated bioarchaeological approach to the Medieval 'Agricultural Revolution': a case study from Stafford, England, c.AD 800–1200. *European Journal of Archaeology*.

2019

Bogaard, A., Fochesato, M. and Bowles, S. 2019. The farming-inequality nexus: new insights from ancient western Eurasia. *Antiquity* 93: 1129-1143.

Fochesato, M., Bogaard, A. and Bowles, S. 2019. Comparing ancient inequalities: the challenges of comparability, bias and precision. *Antiquity* 93: 853-869.

Isaakidou, V., Styring, A., Halstead, P., Nitsch, E., Stroud, E., le Roux, P., Lee-Thorp, J. and Bogaard, A. 2019. From texts to teeth: A multi-isotope study of sheep and goat herding practices in the Late Bronze Age ('Mycenaean') polity of Knossos, Crete. *Journal of Archaeological Science: Reports* 23: 36-56.

Nitsch, E.K., Jones, G., Sarpaki, A., Hald, M.M. and Bogaard, A. 2019. Farming practice and land management at Knossos, Crete: New insights from $\delta^{13}\text{C}$ and $\delta^{15}\text{N}$ analysis of Neolithic and Bronze Age crop remains. In *Country in the City. Agricultural functions of protohistoric urban settlements (Aegean and Western Mediterranean)*, edited by D. Garcia, R. Orgeolet, M. Pomadère and J. Zurbach. Oxford: Archaeopress, pp. 152-168.

Nitsch, E.K., Lamb, A.L., Heaton, T.H.E., Vaiglova, P., Fraser, R., Hartman, G., Moreno-Jiménez, E., López-Piñero, A., Peña-Abades, D., Fairbairn, A., Eriksen, J., Bogaard, A. 2019. Preservation and interpretation of $\delta^{34}\text{S}$ values in charred archaeobotanical remains. *Archaeometry* 61: 161-178.

Styring, A.K., Diop, A.M., Bogaard, A., Champion, L., Fuller, D.Q., Gestrich, N., MacDonald, K.C. and Neumann, K. 2019. Nitrogen isotope values of *Pennisetum glaucum* (pearl millet) grains: towards a reconstruction of past cultivation conditions in the Sahel, West Africa. *Vegetation History and Archaeobotany*.

Styring, A.K., Evans, J.A., Nitsch, E.K., Lee-Thorp, J.A. and Bogaard, A. 2019. Revisiting the potential of carbonized grain to preserve biogenic $^{87}\text{Sr}/^{86}\text{Sr}$ signatures within the burial environment. *Archaeometry* 61: 179-193.

2018

Alagich, R., Gardeisen, A., Alonso, N., Rovira, N. and Bogaard, A. 2018. Using stable isotopes and functional weed ecology to explore social differences in early urban contexts: the case of Lattara in mediterranean France. *Journal of Archaeological Science* 93: 135-149.

Bogaard, A., Ater, M. and Hodgson, J.G. 2018. Arable weeds as a case study in plant-human relationships beyond domestication. In C. Stépanoff and J.-D. Vigne (eds) *Hybrid Communities: Biosocial approaches to domestication and other trans-species relationships*. London: Routledge, 97-112.

Bogaard, A., Styring, A., Whitlam, J., Fochesato, M. and Bowles, S. 2018. Farming, inequality and urbanization: a comparative analysis of late prehistoric northern Mesopotamia and south-west Germany. In *Ten Thousand Years of Inequality: The Archaeology of Wealth Differences*, edited by Timothy A. Kohler and Michael E. Smith. Tucson: University of Arizona Press, Amerind Seminar Series, pp. 201-229.

Bogaard, A., Styring, A., Ater, M., Hmimsa, Y., Green, L., Stroud, E., Whitlam, J., Diffey, C., Nitsch, E., Charles, M., Jones, G. and Hodgson, J. 2018. From traditional farming in Morocco to early urban agroecology in northern Mesopotamia: combining present-day arable weed surveys and crop isotope analysis to reconstruct past agrosystems in (semi-)arid regions. *Environmental Archaeology* 23: 303-322.

Green, L., Charles, M. and Bogaard, A. 2018. Exploring the agroecology of Neolithic Çatalhöyük, central Anatolia: An archaeobotanical approach to agricultural intensity based on functional ecological analysis of arable weed flora. *Paléorient* 44.2: 29-43.

Orton, D., Anvari, J., Gibson, C., Last, J., Bogaard, A., Rosenstock, E. and Biehl, P.F. 2018. A tale of two tells: dating the Çatalhöyük West Mound. *Antiquity* 92: 620-639.

Vaiglova, P., Halstead, P., Pappa, M., Triantaphyllou, S., Valamoti, S.M., Evans, J., Fraser, R., Karkanias, P., Kay, A., Lee-Thorp, J. and Bogaard, A. 2018. Of cattle and feasts: Multi-isotope investigation of animal husbandry and communal feasting at Neolithic Makriyalos, northern Greece. *PLoS ONE* 13(6): e0194474. <https://doi.org/10.1371/journal.pone.0194474>

Whitlam, J., Bogaard, A., Matthews, R., Matthews, W., Mohammadifar, Y., Ilkhani, H. and Charles, M. 2018. Pre-agricultural plant management in the uplands of the central Zagros: the archaeobotanical evidence from Sheikh-e Abad. *Vegetation History and Archaeobotany* 27: 817-831.

2017

Bogaard, A. 2017. The archaeology of food surplus. *World Archaeology* 49: 1-7.

Bogaard, A. 2017. Neolithic 'cooperatives': assessing supra-household cooperation in crop production at Çatalhöyük and beyond. In M. Benz, H.-G. K. Gebel and T. Watkins (eds) *The Construction of Neolithic Corporate Identities (ICAANE Workshop Basel, June 9-10th, 2014)*. Berlin: ex oriente, pp. 119-133.

Bogaard, A. and Styring, A. 2017. Plants, people and diet in the Neolithic of western Eurasia. In J. Lee-Thorp and A. Katzenberg (eds) *Oxford Handbook of Ancient Diet*. Oxford: Oxford University Press.

Bogaard, A., Arbogast, R.-M., Ebersbach, R., Fraser, R.A., Knipper, C., Krahn, C., Schäfer, M., Styring, A. and Krause, R. 2017. The Bandkeramik settlement of Vaihingen an der Enz, Kreis Ludwigsburg (Baden-Württemberg): an integrated perspective on land use, economy and diet. *Germania* 94 (2016): 1-60.

Bogaard, A., Filipović, D., Fairbairn, A., Green, L., Stroud, E., Fuller, D. & Charles, M. 2017. Agricultural innovation and resilience in a long-lived early farming community: the 1500-year sequence at Neolithic-early Chalcolithic Çatalhöyük, central Anatolia. *Anatolian Studies* 67: 1-28. doi: 10.1017/S0066154617000072.

Bogaard, A., Jacomet, S. and Schibler, J. 2017. Towards an integrated bioarchaeological perspective on the central European Neolithic: understanding the pace and rhythm of social processes through comparative discussion of the western loess belt and Alpine foreland. In Bickle, P., Cummings, V., Hofmann, D. and Pollard, J. (eds), *The Neolithic of Europe. Papers in Honour of Alasdair Whittle*. Oxford: Oxbow, pp. 120-142.

Cavanagh, W., Renard, J., Bogaard, A., Gardeisen, A., Cantuel, J., Vaiglova, P. and Diffey, C. 2017. Farming Strategies at Kouphovouno, Lakonia, in the MN-LN periods. In Apostolos, A., Kalogiropoulou, E., Kalayci, T. and Karimali, L. (eds) *Communities, Landscapes and Interaction in Neolithic Greece*. Ann Arbor, Michigan: International Monographs in Prehistory, pp. 281-291.

Charles, M., A. Bogaard, G. Jones, J.G. Hodgson & P. Halstead, 2002. Towards the archaeobotanical identification of intensive cereal cultivation: present-day ecological investigation in the mountains of Asturias, northwest Spain. *Vegetation History and Archaeobotany* 11, 133-142.

Charles, M., G. Jones & J.G. Hodgson, 1997. FIBS in archaeobotany: functional interpretation of weed floras in relation to husbandry practices. *Journal of Archaeological Science* 24, 1151-1161.

Coleman, J.E., Karimali, E., Karali, L., Fillios, M., Diffey, C., Vaiglova, P., Bogaard, A., Joos, J. and Angeli, E. 2017. The environment and interactions of Neolithic Halai. In Apostolos, A., Kalogiropoulou, E., Kalayci, T. and Karimali, L. (eds) *Communities, Landscapes and Interaction in Neolithic Greece*. Ann Arbor, Michigan: International Monographs in Prehistory, pp. 97-125.

Diffey, C., Neef, R. and Bogaard, A. 2017. The archaeobotany of large-scale hermetic cereal storage at the Hittite capital of Hattusha. In A. Schachner (ed.), *Innovation versus Beharrung: Was macht den Unterschied des hethitischen Reichs im Anatolien des 2. Jahrtausends v. Chr? Internationaler Workshop zu Ehren von Jürgen Seeher, Istanbul 23-24. Mai 2014*. Byzas 23. Istanbul: Ege Yayinlari, pp. 185-201.

García-Granero, J.J., Urem-Kotsou, D., Bogaard, A. and Kotsos, S. 2017. Cooking plant foods in the northern Aegean: Microbotanical evidence from Neolithic Stavroupoli (Thessaloniki, Greece). *Quaternary International*.

Hodgson, J.G. et al. Trade-offs between seed and leaf size (seed-phytomer-leaf theory): functional glue linking regenerative with life history strategies... and taxonomy with ecology? *Annals of Botany* 120: 633-652.

Jones, G. and Bogaard, A. 2017. Integration of cereal cultivation and animal husbandry in the British Neolithic: the evidence of charred plant remains from timber buildings at Lismore Fields. In Serjeantson, D. et al. (eds) *Bone Man: Essays I Memory of Tony Legge – Hunter, Fisherman, Fowler and Zooarchaeologist*. Oxford: Oxbow, pp. 221-6.

Kohler, T.K., Smith, M.E., Bogaard, A., Feinman, G.M., Peterson, C.E., Betzenhauser, A., Pailes, M., Stone, E.C., Prentiss, A.M., Dennehy, T.J., Ellyson, L.J., Nicholas, L.M., Fausseit, R.K., Styring, A., Whitlam, J., Fochesato, M., Foor, T.A., Bowles, S. 2017. Greater post-Neolithic wealth disparities in Eurasia than in North America and Mesoamerica. *Nature* 551: 619-622. doi: 10.1038/nature24646.

Nitsch, E., S. Andreou, A. Creuzieux, A. Gardeisen, P. Halstead, V. Isaakidou, A. Karathanou, D. Kotsachristou, D. Nikolaidou, A. Papanthimou, C. Petridou, S. Triantaphyllou, S. Valamoti, A. Vasileiadou and A. Bogaard. 2017. A bottom-up view of food surplus: Using stable carbon and nitrogen isotope analysis to investigate agricultural strategies and diet at Bronze Age Archontiko and Thessaloniki Toumba, northern Greece. *World Archaeology* 49: 105-137.

Santini, B. et al. 2017. The triangular seed mass-leaf area relationship holds for annual plants and is determined by habitat productivity. *Functional Ecology*. doi: 10.1111/1365-2435.12870.

Styring, A.K., M. Charles, F. Fantone, M.M. Hald, A. McMahon, R.H. Meadow, G.K. Nicholls, A.K. Patel, M.C. Pitre, A. Smith, A. Softysiak, G. Stein, J.A. Weber, H. Weiss, and A. Bogaard. 2017. Isotope evidence for agricultural extensification reveals how the world's first cities were fed. *Nature Plants* 3, Article number 17076, doi: 10.1038/nplants.2017.76

Styring, A., Rösch, M., Stephan, E., Stika, H.-P., Fischer, E., Sillmann, M., Bogaard, A. 2017. Centralisation and long-term change in farming regimes: comparing agricultural practice in Neolithic and Iron Age south-west Germany. *Proceedings of the Prehistoric Society* 83: 357-381, doi: 10.1017/ppr.2017.3.

Twiss, K. and Bogaard, A. 2017. Coping with abundance: the challenges of a Good Thing. In M.L. Smith (ed.), *Abundance: the archaeology of plenitude*. University of Colorado Press.

2016

Bogaard, A. 2016. The wheat and the chaff. *Nature Plants* 3 June 2016, Article No. 16079, doi:10.1038/nplants.2016.79

Bogaard, A. and Styring, A. 2016. Siegeszug der Kulturpflanzen - Anbau und Ernährung im Neolithikum. *Archäologie in Deutschland* 2016 (4): 22-23.

Bogaard, A., Hodgson, J., Nitsch, E., Jones, G., Styring, A., Diffey, C., Pouncett, J., Herbig, C., Charles, M., Ertuğ, F., Tugay, O. Filipović, D. and Fraser, R. 2016. Combining functional weed ecology and crop stable isotope ratios to identify cultivation intensity: a comparison of cereal production regimes in Haute Provence, France and Asturias, Spain. *Vegetation History and Archaeobotany* 25: 57-73.

McClatchie, M., Bogaard, A., Colledge, S., Whitehouse, N.J., Schulting, R.J., Barratt, P. and McLaughlin, R. 2016. Farming and foraging in Neolithic Ireland: an archaeobotanical perspective. *Antiquity* 90: 302-318.

McLaughlin, T.R., Whitehouse, N.J., Schulting, R.J., McClatchie, M., Barratt, P. and Bogaard, A. 2016. The changing face of Neolithic and Bronze Age Ireland: a big data approach to the settlement and burial records. *Journal of World Prehistory* 29: 117-153.

Jacomet, S., R. Ebersbach, Ö. Akeret, F. Antolín, T. Baum, A. Bogaard, C. Brombacher, N. K. Bleicher, A. Heitz-Weniger, H. Hüster-Plogmann, E. Gross, M. Kühn, P. Rentzel, B. L. Steiner, L. Wick, and J. M. Schibler. 2016. On-site data cast doubts on the hypothesis of shifting cultivation in the late Neolithic (c. 4300-2400 cal BC): Landscape management as an alternative paradigm. *The Holocene* 26: 1858-1874.

Styring, A., Maier, U., Stephan, E., Schlichtherle, H. and Bogaard, A. 2016. Cultivation of choice: new insights into farming practices at Neolithic lakeshore sites. *Antiquity* 90: 95-110.

Styring, A.K., Ater, M., Hmimsa, Y., Fraser, R., Miller, H., Neef, R., Pearson, J.A. and Bogaard, A. 2016. Disentangling the effect of farming practice from aridity on crop stable isotope values: A present-day model from Morocco and its application to early farming sites in the eastern Mediterranean. *The Anthropocene Review* 3: 2-22, doi: 10.1177/2053019616630762

2015

Bogaard, A. 2015. Lessons from modeling Neolithic farming practice: methods of elimination. In R. Chapman and A. Wylie (eds) *Material Culture as Evidence*. London: Routledge, pp. 243-254.

Bogaard, A. 2015. Communities. In Barker, G. and Goucher, C. (eds) *A World with Agriculture. The Cambridge History of the World, vol 2*. Cambridge: Cambridge University Press, pp. 124-160.

Bogaard, A. 2015. New insights into early farming practice and diet from stable isotope analysis of crop assemblages. In K. Brink, S. Hydén, K. Lennberg, Larsson, L. and Olausson, D. (eds) *Neolithic Diversities: Perspectives from a conference in Lund, Sweden*. Acta Archaeologica Lundensia 8, No. 65, pp. 33-42.

Bogaard, A. 2015. From affluent foraging to 'truly horrible' farming? A response to Sterelny and Watkins. *Cambridge Archaeological Journal* 25: 694-696.

Bogaard, A. and Halstead, P. 2015. Subsistence practices and social routine in Neolithic southern Europe. In C. Fowler, J. Harding, D. Hofmann (eds) *The Oxford Handbook of Neolithic Europe*. Oxford: Oxford University Press, pp. 385-410.

Currie, T. et al. Agricultural productivity in past societies: Toward an empirically informed model for testing cultural evolutionary hypotheses. *Cliodynamics* 6: 24-56.

Fiorentino, G., Ferrio, J.P., Bogaard, A., Araus, J.L. and Riehl, S. 2015. Stable isotopes in archaeobotanical research. *Vegetation History and Archaeobotany* 24: 215-227.

Nitsch, E. K., Charles, M. and Bogaard, A. Calculating a statistically robust $\delta^{13}\text{C}$ and $\delta^{15}\text{N}$ offset for charred cereal and pulse seeds. *STAR* 2015; 1(1), STAR20152054892315Y.0000000001

Styring, A.K., Fraser, R.A., Arbogast, R.-M., Halstead, P., Isaakidou, V., Pearson, J.A., Schäfer, M., Triantaphyllou, S., Valamoti, S.M., Wallace, M., Bogaard, A. and Evershed, R. 2015. Refining human palaeodietary reconstruction using amino acid $\delta^{15}\text{N}$ values of plants, animals and humans. *Journal of Archaeological Science* 53: 504-515.

Wallace, M.P., Jones, G., Charles, M., Fraser, R., Heaton, T.H.E. and Bogaard, A. 2015. Stable carbon isotope evidence for Neolithic and Bronze Age crop water management in the eastern Mediterranean and southwest Asia. *PLoS ONE* 10(6): e0127085.doi:10.1371/journal.pone.0127085