

List of International scientific publications

1. Articles in International peer-reviewed journals

- Benzarti M., Ben Rejeb K., Messedi D., Ben Mna A., Hessini K., Ksontini M., Abdelly C. & **Debez A.** (2014) Effect of high salinity on *Atriplex portulacoides*: Growth, leaf water relations and solute accumulation in relation with osmotic adjustment. *South African Journal of Botany* 95, 70-77.
- Hafsi C., **Debez A.** & Abdelly C. (2014) Potassium deficiency in plants: effects and signaling cascades. *Acta Physiologiae Plantarum* 36, 1055-1070.
- Houmani H., **Debez A.**, Slatni T., Yousfi S., Jellali N., M'sehli W., Abdelly C. & Gharsalli M. (2014) Insights into physiological responses of the halophyte *Suaeda fruticosa* to simultaneous salinity and iron deficiency. *CLEAN - Soil, Air, Water (In press)* DOI: 10.1002/clen.201300810.
- Amari T., Ghnaya T., **Debez A.**, Taamali M., Ben Youssef N., Lucchini G., Sacchi G.A. & Abdelly C. (2014) Comparative Ni tolerance and accumulation potentials between *Mesembryanthemum crystallinum* (halophyte) and *Brassica juncea*: Metal accumulation, nutrient status and photosynthetic activity. *Journal of Plant Physiology* 171(17) 1634-1644.
- Atia A., Rabhi M., **Debez A.**, Abdelly C., Gouia H., Chaffei Haouari C. & Smaoui A. (2014) Ecophysiological aspects and photosynthetic pathways in 105 plants species of saline and arid environments in Tunisia. *Journal of Arid Land* 6(6) 762-770 DOI: 10.1007/s40333-014-0028-2.
- Ben Rejeb K., Benzarti M., **Debez A.**, Bailly C., Savouré A. Abdelly C. & (2014) NADPH oxidase-dependent H₂O₂ production is required for salt-induced antioxidant defense in *Arabidopsis thaliana*. *Journal of Plant Physiology (in Press)*. DOI <http://dx.doi.org/doi:10.1016/j.jplph.2014.08.022>.
- Slama I., Ben Rejeb K., Rouached A., Jdey A., Rabhi M., Talbi O., **Debez A.**, Savouré A. & Abdelly C. (2014) Presence of proline in salinized nutrient solution re-enforces the role of this amino acid in osmoregulation and protects lipid membrane peroxidation in *Arabidopsis thaliana*. *Australian Journal of Crop Science* 8(10), 1367-1372.
- **Debez A.**, Ben Rejeb K., Ghars M.A., Gandour M., Megdiche W., Ben Hamed K., Ben Amor N., Brown S.C., Savouré A. & Abdelly C. (2013) Ecophysiological and genomic analysis of salt tolerance of *Cakile maritima*. *Environmental and Experimental Botany* 92, 64-72.
- Koyro H.-W., Zoerb C., **Debez A.** & Huchzermeyer B. (2013) The effect of hyperosmotic salinity on protein pattern and enzyme activities of halophytes. *Functional Plant Biology* 40(9), 787-804.
- **Debez A.**, Braun H.-P., Pich A., Taamalli W., Koyro H.-W., Abdelly C. & Huchzermeyer B. (2012) Proteomic and physiological responses of the halophyte *Cakile maritima* to moderate salinity at the germinative and vegetative stages. *Journal of Proteomics* 75, 5667-5694.
- Atia A., **Debez A.**, Barhoumi Z., Abdelly C. & Smaoui A. (2012) Investigation of embryo growth and reserve mobilization of water or salt imbibed seeds of *Crithmum maritimum* L. *Acta Botanica Gallica* 159(1), 17-24.
- Benzarti M., Ben Rejeb K., **Debez A.**, Messedi D. & Abdelly C. (2012) Photosynthetic activity and leaf antioxidative responses of *Atriplex portulacoides* subjected to extreme salinity. *Acta Physiologiae Plantarum* 34, 1679-1688.

- Ksouri R., Megdiche W., Jallali I., **Debez A.**, Magné C., Isoda H. & Abdelly C. (2012) Medicinal halophytes: potent source of health promoting biomolecules with medical, nutraceutical and food applications. *Critical Reviews in Biotechnology* 32(4), 289-326.
- Lakhdar A., Slatni T., Iannelli M.A., **Debez A.**, Pietrini F., Jedidi N., Massacci A. & Abdelly C. (2012) Risk of municipal solid waste compost and sewage sludge addition on photosynthetic performance in common crop (*Triticum durum*). *Acta Physiologiae Plantarum* 34, 1017-1026.
- Talbi Zribi O., Labidi N., Slama I., **Debez A.**, Ksouri R., Rabhi M., Smaoui A. & Abdelly C. (2012) Alleviation of phosphorus deficiency stress by moderate salinity in the halophyte *Hordeum maritimum* L. *Plant Growth Regulation* 66(1), 75-85.
- Atia A., **Debez A.**, Barhoumi Z., Smaoui A. & Abdelly C. (2011) Effects of different salts and mannitol on seed imbibition, germination and ion content of *Crithmum maritimum* L. (*Apiaceae*). *Journal of Biological Research* 15, 37-45.
- Atia A., Rabhi M., **Debez A.**, Barhoumi Z., Abdelly C. & Smaoui A. (2011) Factors controlling germination and dormancy processes in dimorphic fruits of *Atriplex inflata* (Chenopodiaceae). *Plant Ecology and Evolution* 144 (3), 307-312.
- Lakhdar A., Hafsi C., **Debez A.**, Montemuerro F., Jedidi N. & Abdelly C. (2011) Municipal solid waste compost use in salt-affected soil reclamation. *Acta Agriculturae Scandinavica, Section B - Plant Soil Science* 61, 284-288.
- Talbi Zribi O., Abdelly C. & **Debez A.** (2011) Interactive effects of salinity and phosphorus availability on growth, water relations, nutrition status, and photosynthetic activity of barley (*Hordeum vulgare* L.). *Plant Biology* 13(6), 872-880.
- Hafsi C., Atia A., Lakhdar A., **Debez A.** & Abdelly C. (2011) Differential responses in potassium acquisition and use efficiencies in the halophytes *Catapodium rigidum* and *Hordeum maritimum* under a wide range of potassium availability. *Plant Production Science* 14(2), 135-140.
- Hessini K., Cruz C., Gandour M., **Debez A.**, Koyro H.-W., Huchzermeyer B. & Abdelly C. (2011) Ammonium nutrition improves salt tolerance of *Spartina alterniflora*. *The European Journal of Plant Science and Biotechnology* 5(2), 33-36.
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- Lakhdar A., Falleh H., Ouni Y., Oueslati S., **Debez A.**, Ksouri R. & Abdelly C. (2011). Municipal solid waste compost application improves productivity, polyphenol content, and antioxidant capacity of *Mesembryanthemum edule*. *Journal of Hazardous Materials* 191, 373-379.
- Gandour M., Tamaalli W., Trabelsi N., Hessini K., Sebei K., **Debez A.** & Abdelly C. (2011) How to optimize the seed and seed-oil production in the cash crop halophyte *Cakile maritima*? *Journal of Medicinal Plant Research* 5(25), 5982-5987.
- **Debez A.**, Saadaoui D., Slama I., Huchzermeyer B. & Abdelly C. (2010) Responses of *Batis maritima* plants challenged with up to two-fold sea water NaCl-salinity. *Journal of Plant Nutrition and Soil Science* 173, 291-299.

- Atia A., **Debez A.**, Barhoumi Z., Pacini E., Abdelly C. & Smaoui A. (2010) The mericarp of the halophyte *Crithmum maritimum* (Apiaceae): structural features, germination, and salt distribution. *Biologia*. 65(3), 489-495.
- Atia A., **Debez A.**, Barhoumi Z., Abdelly C. & Smaoui A. (2010) Seed oil of *Crithmum maritimum* L. exhibits high essential fatty acid content. *African Journal of Biotechnology* 9(39) 6482-6485.
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- Slatni T., Ben Salah I., Kouas S., **Debez A.**, Gouia H., & Abdelly C. (2010) Plant yield and seed quality in two N₂-fixing *Phaseolus vulgaris* L. cultivars grown on calcareous soil. *Symbiosis* 51(3), 249-256.
- Atia A., **Debez A.**, Barhoumi Z., Smaoui A. & Abdelly C. (2009) Histochemical localization of essential oils and bioactive substances in the seed coat of the halophyte *Crithmum maritimum* L. (Apiaceae). *Journal of Plant Biology* 52, 448-452.
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- Ghars M.A., **Debez A.** & Abdelly C. (2009) Interaction between salinity and original habitat during germination of the annual seashore halophyte *Cakile maritima*. *Communications in Soil Science and Plant Analysis* 40, 3170-3180.
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- Kouas S., Louche J., **Debez A.**, Plassard C., Drevon J.J. & Abdelly C. (2009) Effect of phosphorus deficiency on acid phosphatase and phytase activities in common bean (*Phaseolus vulgaris* L.) under symbiotic nitrogen fixation. *Symbiosis* 47, 141-149.
- Mahmoudi H., Koyro H.-W., **Debez A.** & Abdelly C. (2009) Comparison of two chickpea varieties regarding their responses to direct and induced iron deficiency. *Environmental and Experimental Botany* 66, 349-356.
- Megdiche W., Ben Amor N., **Debez A.**, Hessini K., Ksouri R. & Abdelly C. (2009) Physiological and biochemical traits involved in the genotypic variability to salt tolerance of Tunisian *Cakile maritima*.

African Journal of Ecology 47, 774-783.

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- Sebei K., **Debez A.**, Herchi W., Boukhchina S. & Kallel H. (2007) Germination kinetics and seed reserve mobilisation in two flax (*Linum usitatissimum* L.) cultivars under moderate salt stress. *Journal of Plant Biology* 50(4), 447-454.
- Ksouri R., Megdiche W., **Debez A.**, Falleh H., Grignon C. & Abdelly C. (2007) Salinity effects on polyphenol content and antioxidant activities in leaves of the halophyte *Cakile maritima*. *Plant Physiology and Biochemistry* 45(3-4), 244-249.
- Megdiche W., Ben Amor N., **Debez A.**, Hessini K., Ksouri R., Zuily-Fodil Y. & Abdelly C. (2007) Salt tolerance of the annual halophyte *Cakile maritima* as affected by the provenance and the developmental stage. *Acta Physiologiae Plantarum* 29(4), 375-384.
- Hafsi C., Lakhdar A., Rabhi M., **Debez A.**, Abdelly C. & Ouerghi Z. (2007) Interactive effects of salinity and potassium availability on growth, water status, and ionic composition of *Hordeum maritimum*. *Journal of Plant Nutrition and Soil Science* 170(4), 469-473.
- **Debez A.**, Saadaoui D., Ramani B., Ouerghi Z., Koyro H.W., Huchzermeyer B. & Abdelly C. (2006) Leaf H⁺-ATPase activity and photosynthetic capacity of *Cakile maritima* under increasing salinity. *Environmental and Experimental Botany* 57(3), 285-295.
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- Ben Amor N., Ben Hamed K., **Debez A.**, Grignon C. & Abdelly C. (2005) Physiological and antioxidant responses of the perennial halophyte *Crithmum maritimum* to salinity. *Plant Science* 168(4), 889-899.
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sustainable development (formerly *Agronomie*) 25, 389-393.

- Ben Hamed K., **Debez A.**, Chibani F. & Abdelly C. (2004) Salt responses of a facultative and oleaginous halophyte: *Crithmum maritimum*. *Tropical Ecology* 45(1), 151-159.
- **Debez A.**, Ben Hamed K., Grignon C. & Abdelly C. (2004) Salinity effects on germination, growth, and seed production of the halophyte *Cakile maritima*. *Plant and Soil* 262(1-2), 179-189.
- **Debez A.**, Chaibi W. & Bouzid S. (2001) Effet du NaCl et de régulateurs de croissance sur la germination de l'*Atriplex halimus* L. *Cahiers Agricultures*, 10(2), 135-138.

2. Articles as book chapters

- Benzarti M., Ben Rejeb K., **Debez A.** & Abdelly C. (2013) Environmental and economical opportunities for the valorisation of the genus *Atriplex*: New insights. *In* Crop Improvement: New Approaches and Modern Techniques. K. Hakeem, P. Ahmad & M. Ozturk (Eds.), Springer, pp. 441-458.
- **Debez A.**, Koyro H.-W., Abdelly C. & Huchzermeyer B. (2011) Current challenges and future opportunities for a sustainable utilization of halophytes. *In* Tasks for Vegetation Science Vol. 46, Sabkha Ecosystems, Volume III: Africa and Southern Europe. M. Öztürk, B. Böer, H.-J. Barth, S.-W. Breckle, C. Clüsener-Godt & M.A. Khan (Eds.), Springer, pp. 59-77.
- Abdelly C., **Debez A.**, Smaoui A. & Grignon C. (2011) Halophyte-fodder species association may improve nutrient availability and biomass production of the Sabkha ecosystem. *In* Tasks for Vegetation Science Vol. 46, Sabkha Ecosystems, Volume III: Africa and Southern Europe. M. Öztürk, B. Böer, H.-J. Barth, S.-W. Breckle, C. Clüsener-Godt & M.A. Khan (Eds.), Springer, pp. 85-94.
- Koyro H.-W., Geißler N., Hussin S., **Debez A.** & Huchzermeyer B. (2008) Strategies of halophytes to survive in a salty environment. *In* Abiotic Stress and Plant Responses. N.A. Khan and S. Singh (eds.), IK International, pp. 83-104. ISBN: 978-7319-883-0.
- **Debez A.**, Taamalli W., Saadaoui D., Ouerghi Z., Zarrouk M., Huchzermeyer B. & Abdelly C. (2006) Salt effect on growth, photosynthesis, seed yield and oil composition in the potential crop halophyte *Cakile maritima*. *In* Biosaline Agriculture and Salinity Tolerance in Plants. M. Öztürk, Y. Waisel, M.A. Khan & G. Görk (Eds.), Birkhäuser Verlag, Switzerland, pp. 55-63.
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- **Debez A.**, Chaibi W. & Bouzid S. (2003) Physiological responses and structural modifications in *Atriplex halimus* L. plants exposed to salinity. *In* Tasks for Vegetation Science, Vol. 38. Cash Crop Halophytes, Recent Studies. H. Lieth & M. Mochtchenko (Eds.), Kluwer Academic Publishers. Dordrecht, The Netherlands. pp. 19-30.
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