

Outi Elina Maasalo, Anna Zatorska–Goldstein: *Stability of quasiminimizers of the p -Dirichlet integral with varying p on metric spaces*; Helsinki University of Technology, Institute of Mathematics, Research Reports A500 (2006).

Abstract: *We prove a stability result, with respect to the varying exponent p , for a family of quasiminimizers of the p -Dirichlet energy functional on a doubling metric measure space. In addition we prove global higher integrability for upper gradients of quasiminimizers with fixed boundary data, provided the boundary data belongs to a slightly better Newtonian space.*

AMS subject classifications: Primary: 49Q20, Secondary: 31C45, 49N60

Keywords: Caccioppoli inequality, capacity, doubling measure, Gehring lemma, metric space, Newtonian space, p -fatness, Poincaré inequality, quasiminimizer, stability

Correspondence

Outi Elina Maasalo

Institute of Mathematics, Helsinki University of Technology

P.O. Box 1100

FI-02015 Helsinki University of Technology, Finland

outi.elina.maasalo@hut.fi

Anna Zatorska–Goldstein

Institute of Applied Mathematics and Mechanics, University of Warsaw

Banacha 2

PL-02-097 Warsaw, Poland

azator@mimuw.edu.pl

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Helsinki University of Technology

Department of Engineering Physics and Mathematics

Institute of Mathematics

P.O. Box 1100, 02015 HUT, Finland

email:math@hut.fi <http://www.math.hut.fi/>