

R. Černý

**On generalized Moser-Trudinger inequality
without boundary condition**

MATH-KMA-2011/364

June 2011

Submitted

List of preprints released in this series

All preprints available on <http://www.karlin.mff.cuni.cz/kma-preprints/>
E-mail contact to series administrator: kma-prep@karlin.mff.cuni.cz

1999 – 2009

For the details on papers submitted in specified years see the web page of the preprint series.

2010

- MATH-KMA-2010/321 Jan Rataj, Luděk Zajíček: *Critical values and level sets of distance functions in Riemannian, Alexandrov and Minkowski spaces*
- MATH-KMA-2010/322 Stanislav Hencl: *Sobolev homeomorphism with zero jacobian almost everywhere*
- MATH-KMA-2010/323 Stanislav Hencl, Jan Malý, Lubo Pick, Jan Vybíral: *Weak estimates cannot be obtained by extrapolation*
- MATH-KMA-2010/324 H. Bendová and J. Malý: *An elementary way to introduce a Perron-like integral*
- MATH-KMA-2010/325 Luděk Zajíček: *A note on propagation of singularities of semiconcave functions of two variables*
- MATH-KMA-2010/326 Robert Černý, Petr Gurka, Stanislav Hencl: *Concentration compactness principle for generalized Trudinger inequalities*
- MATH-KMA-2010/327 Robert Černý: *Concentration-Compactness principle for embeddings into multiple exponential spaces*
- MATH-KMA-2010/328 Robert Černý: *Homeomorphism with zero jacobian: Sharp integrability of the derivative*
- MATH-KMA-2010/329 Robert Černý: *On singular Moser-Trudinger inequality for embedding into exponential and multiple exponential spaces*
- MATH-KMA-2010/330 Daniel Campbell, Stanislav Hencl: *A note on mappings of finite distortion: Examples for the sharp modulus of continuity*
- MATH-KMA-2010/331 Ondřej Kalenda: *Spaces not containing ell_1 have weak approximate fixed point property*
- MATH-KMA-2010/332 Martin Koc, Luděk Zajíček: *On Kantorovich's result on the symmetry of Dini derivatives*
- MATH-KMA-2010/333 Dalibor Pražák: *Remarks on the uniqueness of second order ODEs*
- MATH-KMA-2010/334 B. Cascales, O. Kalenda and J. Spurný: *A quantitative version of James' compactness theorem*
- MATH-KMA-2010/335 M. Huek, A. Pulgarín: *$C(X)$ as a lattice: A generalized problem of Birkhoff and Kaplansky*
- MATH-KMA-2010/336 Luděk Klepřlík: *The zero set of the Jacobian and composition of mappings*
- MATH-KMA-2010/337 Luděk Zajíček: *Generic Frechet differentiability on Asplund spaces via a.e. strict differentiability on many lines*
- MATH-KMA-2010/338 Ondřej Kurka: *Optimal quality of exceptional points for the Lebesgue density theorem*
- MATH-KMA-2010/339 Robert Černý, Petr Gurka, Stanislav Hencl: *On the Dirichlet problem for the n, α -Laplacian with the nonlinearity in the critical growth range*
- MATH-KMA-2010/340 Z. Lipecki, V. Losert and J. Spurný: *Uniqueness of Cartesian products of compact convex sets*
- MATH-KMA-2010/341 Miroslav Kačena: *On sequentially Right Banach spaces*
- MATH-KMA-2010/342 Robert Černý: *Sharp generalized Trudinger inequalities via truncation for embedding into multiple exponential spaces*
- MATH-KMA-2010/343 Robert Černý: *On the Dirichlet problem for the generalized n -Laplacian: singular nonlinearity with the exponential and multiple exponential critical growth range*
- MATH-KMA-2010/344 Robert Černý, Jan Kolář, Mirko Rokyta: *Concentrated monotone measures with non-unique tangential behaviour in $\mathbb{R}^3$*
- MATH-KMA-2010/345 Ale Nekvinda and Lubo Pick: *Duals of optimal spaces for the Hardy averaging operator*
- MATH-KMA-2010/346 Michal Kraus: *Two remarks on remotality*
- MATH-KMA-2010/347 Michal Kraus: *Point simpliciality in Choquet theory on nonmetrizable compact spaces*
- MATH-KMA-2010/348 Stanislav Hencl, Pekka Koskela: *Composition of Quasiconformal mappings and functions in fractional Sobolev spaces*
- MATH-KMA-2010/349 Tomáš Bárta, Ralph Chill, Eva Faangová: *Every ordinary differential equation with a strict Lyapunov function is a gradient system*

- MATH-KMA-2010/350 Robert Černý: *Generalized Moser-Trudinger inequality for unbounded domains and its application*
- MATH-KMA-2010/351 Václav Mácha: *On Generalized Stokes Problem*
- MATH-KMA-2010/352 Ondřej Kalenda, Hermann Pfitzner and Jiří Spurný: *On quantification of weak sequential completeness*
- MATH-KMA-2010/353 Lenka Slavíková: *Almost-compact embeddings*
- MATH-KMA-2010/354 Robert Černý: *Generalized n -Laplacian: Quasilinear nonhomogenous problem with the critical growth*

2011

- MATH-KMA-2011/355 Marek Cúth: *Separable reduction theorems by the method of elementary submodels*
- MATH-KMA-2011/356 Stanislav Hencl, Pekka Koskela, Tomi Nieminen: *Dimension gap under conformal mappings*
- MATH-KMA-2011/357 C.S. Barroso, O.F.K. Kalenda and P.-K. Lin: *On the approximate fixed point property in abstract spaces*
- MATH-KMA-2011/358 Ana L. Bernardis, Amiran Gogatishvili, Francisco Javier Martín-Reyes, Pedro Ortega Salvador and Luboš Pick: *The one-sided A_p conditions and local maximal operator*
- MATH-KMA-2011/359 O.F.K. Kalenda and J. Spurný: *On a difference between quantitative weak sequential completeness and the quantitative Schur property*
- MATH-KMA-2011/360 Petr Hájek and Michal Kraus: *Polynomials and identities on real Banach spaces*
- MATH-KMA-2011/361 R. Černý: *Note on the Concentration-Compactness Principle for generalized Moser-Trudinger inequalities*
- MATH-KMA-2011/362 Pavel Ludvík and Jiří Spurný: *Descriptive properties of elements of biduals of Banach spaces*
- MATH-KMA-2011/363 O.Kalenda and W.Kubis: *Complementation in spaces of continuous functions on compact lines*
- MATH-KMA-2011/364 R. Černý: *On generalized Moser-Trudinger inequality without boundary condition*