

TOWARDS A BETTER ASSESSMENT OF PAIN AND SUFFERING  
DAMAGES FOR PERSONAL INJURIES

EUROPEAN STUDIES IN LAW AND ECONOMICS SERIES

1. *Group Litigation in European Competition Law. A Law and Economics Perspective*, Sonja E. Keske
2. *Behavioural Economics in Consumer Policy*, Hanneke Luth
3. *Ex-Post Liability Rules in Modern Patent Law*, Rosa Castro Bernieri
4. *Competition and Innovation in the EU Regulation of Pharmaceuticals: The Case of Parallel Trade*, Claudia Desogus
5. *The Law and Economics of Organ Procurement*, Firat Bilgel
6. *Law and Economics in the RIA World. Improving the use of economic analysis in public policy and legislation*, Andrea Renda
7. *Regulatory Competition in European Corporate and Capital Market Law*, Lars Hornuf
8. *Economic Criteria for Criminalization: Optimizing Enforcement in Case of Environmental Violations*, Katarina Svatikova
9. *Definition of the Relevant Market. (Lack of) Harmony between Industrial Economics and Competition Law*, Hila Nevo
10. *Patents as Protection of Traditional Medical Knowledge? A Law and Economics Analysis*, Petra Ebermann
11. *Rethinking the New York Convention. A Law and Economics Approach*, Shen Wei

TOWARDS A BETTER  
ASSESSMENT OF PAIN AND  
SUFFERING DAMAGES FOR  
PERSONAL INJURIES

A Proposal Based on Quality  
Adjusted Life Years

Vaia KARAPANOU



intersentia

Cambridge – Antwerp – Portland

Intersentia Publishing Ltd.  
Sheraton House | Castle Park  
Cambridge | CB3 0AX | United Kingdom  
Tel.: +44 1223 370 170 | Email: mail@intersentia.co.uk

*Distribution for the UK:*  
NBN International  
Airport Business Centre, 10 Thornbury Road  
Plymouth, PL6 7 PP  
United Kingdom  
Tel.: +44 1752 202 301 | Fax: +44 1752 202 331  
Email: orders@nbninternational.com

*Distribution for the USA and Canada:*  
International Specialized Book Services  
920 NE 58th Ave. Suite 300  
Portland, OR 97213  
USA  
Tel.: +1 800 944 6190 (toll free)  
Email: info@isbs.com

*Distribution for Austria:*  
Neuer Wissenschaftlicher Verlag  
Argentinierstraße 42/6  
1040 Wien  
Austria  
Tel.: +43 1 535 61 03 24  
Email: office@nwv.at

*Distribution for other countries:*  
Intersentia Publishing nv  
Groenstraat 31  
2640 Mortsel  
Belgium  
Tel.: +32 3 680 15 50  
Email: mail@intersentia.be

Towards a Better Assessment of Pain and Suffering Damages for Personal Injuries.  
A Proposal Based on Quality Adjusted Life Years  
Vaia Karapanou

© 2014 Intersentia  
Cambridge – Antwerp – Portland  
www.intersentia.com | www.intersentia.co.uk

ISBN 978-1-78068-230-3  
D/2014/7849/75  
NUR 820

British Library Cataloguing in Publication Data. A catalogue record for this book is available from the British Library.

No part of this book may be reproduced in any form, by print, photoprint, microfilm or any other means, without written permission from the publisher.

## ACKNOWLEDGEMENTS

Writing this book would not have been possible without the help, support and good advice of numerous people. If it weren't for Roger van den Bergh and Louis Visscher, I would have never started this PhD in the first place. Roger, I am grateful to you for your support and for giving me the opportunity to research on my own ideas. Louis, your excellent supervision has been a decisive factor for the completion of this book. Thank you for the insightful suggestions, the continuous guidance, the inspiration, the intellectual stimuli and the endless hours of discussion. I owe you my deepest gratitude. A special thank you goes to Anthony Ogus for providing invaluable advice and comments, which critically improved my research, as well as support before and after the defence of the dissertation on which this book is based. I am truly grateful for your help. I would also like to thank Michael Faure for providing resourceful comments and suggestions throughout the writing of this book but most importantly for his attentiveness in the crucial final stage. I am grateful for your help.

Spending three years in the Erasmus School of Law allowed me to test empirically the hypothesis that being in the proximity of incredibly smart people is beneficial for one's research and personal development. For that positive influence I would also like to thank the rest of the amazing RILE group: Ann-Sophie Vandenberghe, Wicher Schreuders, Alessio Paccas, Marianne Breijer, Alessandra Arcuri, Sharon Oded, Franziska Weber, Pieter Desmet, Weiqiang Hu and Klaus Heine. I am more than grateful to Jennifer Arlen, Thomas Ulen, Neil Rickman, Gerhard Wagner, Werner Brouwer, Siewert Lindenbergh and Stefan Weishaar for insightful comments and suggestions during presentations and/or private discussions on parts of this book. The remaining mistakes are my own.

Even though one doesn't wish to be reminded of this after finishing it, the truth is that writing a PhD is a demanding task that involves stressful deadlines, long working hours and makes scarce the time spend with family and friends. I want to apologize to all of those who had to bear with me and cope with time scarcity. An enormous thanks goes to my brother for his inexhaustible humour. Christo, you gave me a reason to smile even in the face of the most absurd circumstances. Stefane, I know you don't like to be thanked but I wouldn't have gone through this without you. You are my sunshine and breath of fresh air. Finally, I would like to thank my parents, Dimitri and Antigone for their unconditional love, patience and support. The example you have set is my driving force. I love you with all my heart and I dedicate this book to you.



# CONTENTS

<i>Acknowledgements</i> .....	v
<i>Table of Cases</i> .....	ix
<i>List of Abbreviations</i> .....	xv
<i>List of Tables and Figures</i> .....	xvii

## **Chapter 1.**

<b>Introduction</b> .....	1
1.1. Aim of the Research .....	1
1.2. Research Questions .....	3
1.3. Methodology .....	5
1.4. Scientific and Societal Relevance .....	7
1.5. Content Structure .....	8

## **Chapter 2.**

### **How Should Pain and Suffering Damages be Assessed?**

<b>A Legal Perspective</b> .....	11
2.1. Goals of Tort Law regarding Pain and Suffering Damages .....	12
2.1.1. Compensation .....	13
2.1.2. Satisfaction .....	15
2.1.3. Deterrence .....	17
2.1.4. Loss Distribution .....	18
2.1.5. Punishment .....	19
2.2. Pain and Suffering Damages in Cases of Personal Injuries .....	20
2.2.1. 'Pain and Suffering Damages' in Different Countries .....	21
2.2.2. The Interplay between Tort Law and the Law of Damages .....	27
2.3. Current Court Practice in Personal Injury Cases .....	28
2.3.1. How do Courts Assess Pain and Suffering Damages? .....	28
2.3.2. Can the Goals of the Law of Torts (and Damages) be Reached? ..	36

**Chapter 3.**

**How Should Pain and Suffering Damages be Assessed?**

**A Law and Economics Perspective . . . . . 39**

3.1. Goals of Tort Law according to Law and Economics: Minimization of Total Accident Costs . . . . . 40

    3.1.1. The Goal of Deterrence. . . . . 41

    3.1.2. The Goal of Insurance/Loss Spreading . . . . . 48

    3.1.3. The Goal of Reducing Tertiary (Administrative) Costs . . . . . 58

3.2. Damages for Immaterial Losses: How Should they be Treated? . . . . . 60

    3.2.1. Dealing with the Discrepancy: Proposals So Far . . . . . 60

    3.2.2. Striking a Balance between Deterrence and Insurance: Ex Ante Determined Pain and Suffering Damages . . . . . 63

    3.2.3. The Value of Statistical Life (Year) for Fatalities. . . . . 65

**Chapter 4.**

**Quality Adjusted Life Years. A Measure for the Economic Evaluation of Health Care . . . . . 69**

4.1. Context and Origin of the QALY . . . . . 70

    4.1.1. Cost-Effectiveness Analysis for the Economic Evaluation of Health Care . . . . . 72

    4.1.2. Theoretical Foundations of QALY-Based CEA. . . . . 75

4.2. What is the Quality Adjusted Life Year? . . . . . 79

4.3. Calculation of QALY-Weights . . . . . 82

    4.3.1. Single Question Format Valuation Techniques . . . . . 82

    4.3.2. Generic Measures . . . . . 90

4.4. Who Should Value Health? . . . . . 97

4.5. QALYs and Fairness Considerations . . . . . 99

4.6. Monetization: Cost or WTP per QALY? . . . . . 103

    4.6.1. Cost per QALY . . . . . 107

    4.6.2. WTP per QALY . . . . . 109

4.7. Discounting . . . . . 111

4.8. Disability Adjusted Life Years: an Alternative to QALYs? . . . . . 114

**Chapter 5.**

**Using QALYs in a Tort Law Context. Assessing Pain and Suffering Damages . . . . . 117**

5.1. Exploiting Existing QALY Research. . . . . 118

    5.1.1. Utilizing Available QALY-Weights. . . . . 119

    5.1.2. Deciding the Monetary Value of a QALY . . . . . 122

    5.1.3. Applying a Discount Factor to Reflect Present Value . . . . . 125



5.2. Synthesis ..... 128  
 5.2.1. A Graphical Representation of the Proposed Framework ..... 129  
 5.2.2. The Case of Deafness ..... 130  
 5.3. Can the Goals of Tort Law with respect to Pain and Suffering Damages be Reached? ..... 133  
 5.3.1. Implications for Compensation and Satisfaction ..... 134  
 5.3.2. Implications for Deterrence and Loss Spreading: Striking a Balance between the Goals ..... 137  
 5.3.3. Economizing on Administrative Costs of the Legal System .... 140  
 5.4. Benefits Extending beyond the Goals of Tort Law ..... 143  
 5.4.1. Dealing with Strategic Behavior ..... 143  
 5.4.2. Inducing Victim Mitigation of Losses ..... 144  
 5.5. Challenges ..... 145  
 5.5.1. Using the Appropriate Research Results ..... 145  
 5.5.2. How to Deal with Multiple Injuries? ..... 146

**Chapter 6.**

**Pain and Suffering Damages Based on QALYs. Circumventing Victims’ (and Judges’) Hedonic Misperceptions** ..... 147  
 6.1. Relevance of Psychological Insights for Pain and Suffering Damages .. 148  
 6.1.1. Hedonic Adaptation Neglect ..... 150  
 6.1.2. Focalism/Focusing Illusion ..... 157  
 6.1.3. A Counterintuitive Empirical Result or just a Preference for being Healthy? ..... 160  
 6.2. Pain and Suffering Damages Incorporating Insights from Cognitive Psychology: Proposals So Far ..... 161  
 6.3. QALYs and Hedonic Adaptation: Pain and Suffering Damages Based on the QALY Framework ..... 166  
 6.4. Should Psychological Insights Influence the Assessment of Pain and Suffering Damages? ..... 171

**Chapter 7.**

**The QALY Framework Applied. Practical Examples and Implementation Recommendations** ..... 173  
 7.1. Personal Injury Cases ..... 174  
 7.1.1. The Case of Paralysis/Severe Spinal Cord Injury ..... 175  
 7.1.2. The Case of Lower Leg Amputation ..... 181  
 7.1.3. The Case of Vision Loss in One Eye ..... 186  
 7.1.4. The Case of HIV Contraction ..... 191  
 7.2. Discussion of the Resulting Amounts ..... 199  
 7.3. Implementation Recommendations ..... 203

<b>Chapter 8.</b>	
<b>Epilogue</b> .....	205
8.1. Can the Proposed QALY Framework Improve the Current Assessment of Pain and Suffering Damages? .....	206
8.2. Using a Measure from Health Economics in the Context of Tort Law..	211
8.3. QALYs in Legal and Law and Economics Scholarship.....	213
8.4. Avenues for Future Research .....	216
8.5. The Way Forward.....	216
<i>Bibliography</i> .....	219

# TABLE OF CASES

## ENGLAND AND WALES

Cook v. J.L. Kier and Co. [1970] WLR 774  
Wise v. Kaye [1962] 1 QB 638  
H. West & Son Ltd v. Shepard [1964] AC 326  
Lim Poh Choo v. Camden and Islington Area Health Authority [1980] AC 174  
Heil v. Rankin [2001] QB 272  
Alan Roger Plater v. Sonatrach [2004] EWHC 146 (Qb)  
Simmons v. Castle [2012] EWCA Civ 1288

## FRANCE

François vs. Monsanto T.G.I. Lyon, 13 fév. 2012, n° 2012/144

## GERMANY

LG Bonn 02.05.1994 9 O 323/93  
LG München I 23.08.2004 17 O 1089/03 SP 2005, 52  
LG Baden-Baden 24.10.2006 1 O 374/04  
LG München I 11.01.2007 19 O 12070/04  
LG Münster 17.04.2009 16 O 532/07, NJW 2010, 86  
OLG Saarbrücken 16.05.1986, NJW-RR 1987, 984  
OLG Hamburg 20.04.1990 zfs 1990, 260; NJW 1990, 2322  
OLG Frankfurt a. M. 01.12.2001 1 U 35/03  
OLG Stuttgart 18.03.2003 1 U 81/02 NJOZ 2003, 3064  
OLG Frankfurt 23.12.2003 8 U 140/99  
OLG Koblenz 18.03.2004 5U 1134/03 NJW-RR 2004, 1025  
OLG Hamm 09.03.2006 6 U 62/05, NJW-RR 2006, 1251  
OLG München 24.09.2010 10 U 2671/10, BeckRS 2010, 23467  
OLG Schleswig 09.10.2009 4 U 149/08  
BGH 16.02.1993 NJW 1993, 1531  
BGH 13.10.1992 NJW 1993, 781

## GREECE

MonProtLeukadas 472/2004  
EfAth 7146/1992, [1995] HellDni, 647, No. 11  
EfThes 2717/2002  
EfLarisis 919/2005, [2006] ESigD, 283  
EfAth 6009/2005  
EfDod 307/2005  
EfThes 1328/2006, Armenopoulos, 8/2008  
EfThes 2601/2006  
EfPatron 151/2009  
EfPatron 672/2009  
EfAth 2591/2010, NV 61/2013, 2695  
EfPirea 102/2011, Piraiki Nomologia 23/2011, 156  
EfPirea 24/2012  
EfPirea 278/2013  
DPrAth 3441/2006  
DEfThes 1876/2012  
AP 526/2006  
AP 433/2008, [2008] ESigD, 150  
AP 605/2008, [2008] ESigD, 165  
AP 1216/2008, [2008] ESigD, 428  
AP 1174/2009, [2009] ESigD, 429  
AP 525/2011  
AP 72/2012  
AP 924/2013

## ITALY

Repetto v. A.M.T. di Genova, Corte cost., 14/07/1986, no. 184  
Valentini v. Castaldini, Trib. Verona, 15/10/1990  
Tribunale di Savona, 29/07/2005  
Tribunale di Roma, sez. XIII, 24/11/2005  
Tribunale di Roma, sez. II, 16/01/2009, n. 908  
Tribunale di Pisa, 01/08/2009, n.189/2002 R.G  
Tribunale di Modena, sez. Lav., 30/11/2011, n. 287  
Tribunale di Roma, XIII sez. Civ., 22/02/2012 n. 36620  
Corte d'Appello di Roma, 23/02/2009  
Corte di Appello di Bari, sez. II nr. 737, 23/05/2011  
Cass. Civ., sez. III 04/03/2008 n. 5795  
Cass. Civ., sez. III 12/12/2008 n. 29191  
Cass. Civ., sez. III 13/05/2009 n. 11059  
Cass. Civ., sez. III 07/06/2011 n. 12408  
Cass. Civ., sez. III 13/07/2011 n. 15373

Cass. Civ., sez. III 10/03/2012 n. 5770  
 Cass. Civ., sez. III 21/04/2012 n. 9147  
 Cass. Civ., sez. III 26/10/2012 n. 18484  
 Cass. Civ., sez. III 03/10/2013 n. 22585  
 Cass. Civ., sez. III 14/01/2014 n. 531  
 Cass. Civ., sez. III 23/01/2014 n. 1361  
 Cass. Civ., sez. III 28/01/2014 n. 1762  
 Cass., 24/10/2008 n. 25751  
 Cass., UU. sez. Civ., 11/11/2008 n. 26972  
 Cass., UU. sez. Civ., 14/01/2009 n. 557

## THE NETHERLANDS

Rb. Groningen, 24-03-2000, rolnr. 98-1028  
 Rb. Den Haag, 19-06-2002, rolnr. 99-791  
 Rb. Zwolle, 02-10-2002, rolnr. 01-1113  
 Rb. Utrecht, 31-03-2004, rolnr. 03-155  
 Rb. Alkmaar, 24-12-2008, VR 2009/60  
 Rb. Rotterdam, 20-10-2010, VR 2011/135  
 Rb. Midden-Nederland, 06-02-2013, RAV 2013/47  
 Hof Den Haag, 19-03-1996, VR 1999/149  
 Hof Arnhem, 30-11-2004, VK 2005/73, 381  
 Hof Den Bosch, 17-10-2006, VR 2007/11  
 Hof Leeuwarden, 08-02-2011, JA 2011/87  
 HR 08-07-1992, nr. 14852, NJ 1992/714  
 HR 20-09-2002, NJ 2004/112

## UNITED STATES

Xavier vs. Philip Morris USA Inc., 787 F. Supp. 2d, 1075 (N.D. Cal. 2011)



## LIST OF ABBREVIATIONS

CBA	Cost-Benefit Analysis
CEA	Cost-Effectiveness Analysis
CUA	Cost-Utility Analysis
DALY	Disability Adjusted Life Year
EU	European Union
HUI	Health Utilities Index
QALY	Quality Adjusted Life Year
SG	Standard Gamble
TTO	Time Trade-Off
UK	United Kingdom
USA	United States of America
VAS	Visual Analogue Scale
VSL	Value of Statistical Life
VSLY	Value of Statistical Life Year
WTP	Willingness To Pay
WTA	Willingness To Accept
NICE	National Institute for Health and Clinical Excellence





# LIST OF TABLES AND FIGURES

## TABLES

Table 1.	Damages awarded for immaterial losses in England, Germany, Greece, Italy and the Netherlands . . . . .	35
Table 2.	Pain and suffering damages for severe spinal cord injuries . . . . .	179
Table 3.	Pain and suffering damages for amputation of the lower leg. . . . .	185
Table 4.	Pain and suffering damages for loss of sight in one eye and loss of an eye. . . . .	190
Table 5.	Pain and suffering damages for HIV contraction . . . . .	198

## FIGURES

Figure 1.	Comparison of medical interventions A and B on the basis of the QALYs generated. . . . .	82
Figure 2.	A lasting injury that does not affect life expectancy . . . . .	129
Figure 3.	An injury that heals . . . . .	129
Figure 4.	An injury affecting both quality of life and life expectancy . . . . .	130

