1. Family name: HALANAY
2. First names: ANDREI
3. Date of birth: 1952, August, 18
4. Nationality: Romanian
5. Civil status: Married, two children (born 1977,1979)
6. Education:

Institution [Dates]	Degree(s) or Diploma(s) obtained
University of Bucharest, September 1971-July 1975	B.A. (Licence) in Mathematics
University of Bucharest, September 1975-July 1976	Master in Mathematical Analysis
University of Bucharest, 1978-1988 (no frequency)	Ph. D (Doctorat) in Mathematics
XXXXX	XXXXX
XXXXX	XXXXX
XXXXX	XXXXX
XXXXX	XXXXX

7. Language skills: (1 to 5 (1 = excellent; 5 = poor))

Language	Reading	Speaking	Writing
Romanian	1	1	1
English	2	3	3
French	2	3	3
Russian	3	5	5

8. Membership of professional bodies: AMS, SIAM
9. Present position: Professor, University Politehnica of Bucharest
10. Years within the firm: 31
11. Key qualifications:

- Teaching: Mathematical Analysis, Differential Equations, Complex Analysis, Integral Equations.
- Research: Operator Theory; Applications of Differential Equations and of Dealy Differential equations in Biology and Engineering ; Shape optimization and fluid structure interaction.

13. Professional experience:

Dates	Location	Company	Position
Sept 1976-March 1982:	Bucharest	Industrial high school no.25	Mathematics teacher
Description: Teaching hours for high school pupils with additional educational activities.Permanently appointed,			

Dates	Location	Company	Position

March 1982-	Bucharest	University Politehnica of Bucharest	Teaching assistant (1982-1990), lecturer (1990-1998),assistant professor (maitre de conference) (1998-2005), full professor (2005-)
Description: Teaching: Courses and applications in Mathematical Analysis, Differential Equations, Complex Analysis, Integral Equations. Research: Fundamental research in Operator Theory. Applied research in Differential equations			

Dates	Location	Company	Position
5-24 June 2006	Pau, France	University of Pau	Invited through the France-Romania cooperation program Brancusi
Description: Work with French colleagues on problems of mathematical modeling of hematological diseases.			

14. Other relevant information:

- Invited speaker at the 30 –th International School in Automatic Control, Grenoble, 2009.
- Member in the editorial board of the journal Mathematics in Engineering, Science and Aerospace.
- Co-organiser of the conference "Modelisation mathematique en biologie et en medicine", Craiova, 2006

List of papers

Papers in International journals

1. I. Ursu, A. Toader, A. Halanay, S. Balea (2013), New stabilization and tracking control laws for electrohydraulic servomechanisms, European J. of Control 19, 65-80.
2. S. Balea, A. Halanay, I. Ursu (2013), New results on the problem of the stabilization of equilibria for models of electrihydraulic servoactuators, Discrete and Continous Dynamical Systems, series S, vol. 6, no. 6, 1551-1567.
3. A. Halanay, L. Pandolfi (2012), Lack of controllability of the heat equation with memory, Systems & Control Letters, 61, 999-1002, doi:10.1016/j.sysconle.2012.07.002
4. A. Halanay (2012), Periodic solutions in a mathematical model for the treatment of chronic myelogenous leukemia , Mathematical Modelling of Natural Phenomena, vol. 7, no.1, 235-244 .
5. S.Balea, A. Halanay, I. Ursu (2010), Coordinates transformation and stabilization for switching models of actuators in servoelastic framework, Applied Mathematical Sciences, vol. 4, no 73-76, 3625-3643.
6. A. Halanay, A. Ionita, C. A. Safta (2010), Hopf bifurcations through delay in pilot reaction in a longitudinal flight, Nonlinear Dynamics 60 (3), pp. 413-423, DOI : 10.1007/s11071-009-9605-x.
7. A. Halanay, D. Tiba (2009), Shape optimization for stationary Navier-Stokes equations, Control and Cybernetics, vol. 38, no. 4, 1359-1375.

8. A. Halanay, I. Ursu (2009), Stability of some switched nonlinear systems with applications to control synthesis for electrohydraulic servomechanisms, IMA Journal of Applied Mathematics, vol. 74, no 3, 361-373.
9. A. Halanay, C. A. Safta, I. Ursu, F. Ursu (2009), Stability analysis for a nonlinear model of a hydraulic servomechanism in a servoelastic framework, Nonlinear Analysis:Real World Applications 10, 1197-1209
10. M. Adimy, F. Crauste, A. Halanay, M. Neamtu, D. Opris (2006), Stability of Limit Cycles in a Pluripotent Stem Cell Dynamics Model, Chaos, Solitons and Fractals, 27(4), 1091-1107.
11. A. Halanay, C. A. Safta (2005),Stabilization of some nonlinear controlled electrohydraulic servosystems, Applied Mathematics Letters, vol.18,no.8, pp.911-915..
12. A. Halanay, C. A. Safta, I. Ursu, F. Ursu (2004), Stability of equilibria in a four-dimensional nonlinear model of a hydraulic servomechanism, Journal of Engineering Mathematics, vol.49, no. 4, p. 391-406 .
13. A.Halanay (2003), On the stability of some equilibrium points in a plankton population model, Dynamical Systems.An International Journal, 18,no.3, p.227-231
14. A.Halanay, C. A. Safta (2000), Existence and stability of normal motions in loaded Hydraulic copying systems with periodic and composed inputs, Z. Angew. Math. Mech., 80, no. 2,93-101.
15. A.Halanay, C. A. Safta (1999),Stability and accuracy of steady-state motions in loaded copying systems:an analytical approach,Computer Assisted Mech.and Engineering Sci.,6,p.107-113.
16. A.Halanay, C. A. Safta (1998), Periodic motions for loaded two control edges hydraulic copying systems,Computer Methods in Applied Mechanics and Engineering,158,p.367-374.
17. A.Halanay (1991), A model for a general linear bounded operator between two Hilbert spaces, Acta.Sci Math. (Szeged), 55,no.1-2,p.119-128
18. A.Halanay (1990), On the existence of invariant subspaces for some contractions with spectrum dominating an arc on the unit circle, J.Operator Theory, 23, p.51-66.

Papers in National journals

1. S. Balea, A. Halanay, I. Ursu (2010), Coordinate transformations and stabilization of some switched control systems with application to hydrostatic electrohydraulic servoactuator, J. Control Engin. Appl. Informatics, vol 12, no. 3, pp 67-72.
2. A. Halanay, A. Ionita (2010), Existence and stability of periodic motions in some roll-coupling dynamics of an aircraft, Proc. Romanian Academy, Ser. A, vol 11. no.2, pp. 103-107.
3. A. Halanay (2010), Stability analysis for a mathematical model of chemotherapy action in hematological diseases, Bull. Math. Soc. Sci. Math. Roumanie, 53 (101), no. 1, p. 3-10..
4. A. Halanay (2010), Treatment induced periodic solutions in some mathematical models of tumoral cell dynamics, Mathematical Reports, 12(62), no. 4 .
5. S. Balea, A. Halanay, I. Ursu (2009), Stabilization through coordinates transformation for switched systems associated to electrohydraulic servomechanisms, Mathematical Reports, 11(61), no. 4, p. 279-292.
6. I.Ursu, F. Ursu, A.Halanay, C.A.Safta (2008), Equilibrium Stability of a Servo Actuating Flight Controls in a Servoelastic Framework, Acta. Univ. Apulensis, 15, pp. 179-189.
7. A. Halanay, I. Ursu (2007), Stability of equilibria in a model for electrohydraulic

servomechanisms, Mathematical Reports,vol 9(59), nr.1, pp. 47-54.

8. A. Halanay (2007), Some remarks on the stability of the "dead-ocean" steady- state in a plankton population model, Bull.Math. Soc. Sci. Math. Roumanie, Tome 50(98), no.2.
9. A.Halanay (2004), Controlled factorization for some commuting pairs of contractions with thin spectrum,Revue Roum.de Math.Pures et Appl.49 no.4, p.323-354.
10. A.Halanay (2001), Weak*-embedding l^1 into H^∞ **(**D**):**an example, Bull.Math.Soc.Sci.Math.Roumanie 44(92), no.2, p.199-207.
11. A.Halanay (1999), Factorisation for contractions with essential resolvent rapidly growing near an arc on the unit circle,Math.Reports 1,no.1,p.49-81.
12. A.Halanay, C. A. Safta (1999), Behavior of unloaded copying systems near the stability boundary,Sci.Bull.UPB Ser.A,61,no.1-2,p.65-81.
13. A.Halanay (1998), On perturbation of boundedly complete basic sequences in Banach spaces, Sci.Bull.UPB Ser.A, 60,no.3-4,p.129-135..
14. A.Halanay (1997), Sequences of non-weakly compact sets in **A(D)*** and Schauder decompositions of l^1, Stud. Cerc. Mat. 49, no. 5-6, p. 331-338.
15. A.Halanay (1996), Subspaces of H^infty and the study of contractions with spectral radius one,Revue Roumaine de Math.Pures et Appl.41,no.1-2,p.51-82.
16. A.Halanay (1989), A *J*-isometric dilation of a continuous semigroup with positive generator,Revue Roumaine de Math.Pures et Appl.34, no.1, p.23-27.

Chapters in books

1. C. Murea, A.Halanay (2013), Embedded domain technique for a fluid-structure interaction problem, System Modeling and Optimization, D. Homberg, F. Troltzsch eds., IFIP Advances in Information and Communication Technology, vol 391, p. 358-367, ISBN 978-3-642-36061-9, Springer, Berlin.
2. A.Halanay, C. Murea (2013), Fixed domain algorithms in shape optimization for stationary Navier-Stokes equations, System Modeling and Optimization, D. Homberg, F. Troltzsch eds.IFIP Advances in Information and Communication Technology, vol 391, p. 378-386, ISBN 978-3-642-36061-9, Springer, Berlin.
3. A. Halanay, I. Ursu (2010), Stability analysis of equilibria in a switching nonlinear model of a hydrostatic electrohydraulic actuator, in *Mathematical Analysis and Applications in Engineering Aerospace and Sciences, S. Sivasundaram (ed).* Cambridge Scientific Publishers, ISBN 978-1-904868-798
4. S. Balea, A. Halanay, F. Ursu, I. Ursu (2009), Geometric Methods in Control Synthesis for Electrohydraulic Servoactuators in Servoelastic Framework, *Seventh International Conference on Mathematical Problems in Engineering and Aerospace Sciences, S.Sivasundaram (ed*), pp. 51-57, Cambridge Scientific Publishers.
5. A.Halanay, I. Ursu (2009), Stabilization in Switching Models for Electrohydraulic Servoactuators in a Servoelastic Framework, *Seventh International Conference on Mathematical Problems in Engineering and Aerospace Sciences, S.Sivasundaram (ed)*, pp. 73-80, Cambridge Scientific Publishers.
6. A.Halanay, I. Ursu, C. A. Safta, F. Ursu (2009), Control Synthesis for Electrohydraulic Servoactuators in a Servoelastic Framework, *Seventh International Conference on Mathematical Problems in Engineering and Aerospace Sciences, S.Sivasundaram (ed)*, pp. 716-723, Cambridge Scientific Publishers.
7. A. Halanay, C. A. Safta, F. Ursu, I. Ursu (2007), Stability analysis and tracking control synthesis of a hydraulic servo in a servoelastic framework: backstepping

design, *Proceedings of Sixth International Conference on Mathematical Problems in Engineering and Aerospace Sciences, S.Sivasundaram (ed)*, pp. 839-846, Cambridge Scientific Publishers.

8. A. Halanay, F. Popescu, C. A. Safta, F. Ursu, I. Ursu (2005), Stability analysis and nonlinear control synthesis for hydraulic servos actuating primary flight controls, in *ICNPAA 2004, S. Sivasundaram editor*, pp.243-251, Cambridge Scientific Publishers.
9. A.Halanay (1987), Extension of the (BCP)-technique, in *Operators in Indefinite Metric Spaces, Scattering Theory and Other Topics (H. Helson, B. Sz.-Nagy, F. H. Vasilescu, D. Voiculescu, editori)*, Birkhäuser**,** pp.195-201, ISBN 3-7643-1843-0.

Proceedings of international conferences

1. R. Radulescu, D. Candea, A. Halanay (2012), Stability and bifurcation in a model for the dynamics of stem-like cells in leukemia under treatment, ICNPAA - 2012, ed. S. Sivasundaram, American Institute of Physics Proceedings, 1493, p. 758-763, ISBN 978-0-7354-1105-0.
2. S. Balea, A. Halanay, D. Jardan (2012) A delay differential equations mathematical model for the immune response in leukemia, ICNPAA-2012, ed. S. Sivasundaram, American Institute of Physics Proceedings 1493, p. 67-71, ISBN 978-0-7354-1105-0 .
3. A. Halanay (2012), Periodicity in cell dynamics in some mathematical models for the treatment of leukemia, ICNPAA - 2012, ed. S. Sivasundaram, American Institute of Physics Proceedings 1493, p. 446-450, ISBN 978-0-7354-1105-0.
4. C. A. Safta, A.Halanay, A. Ionita (2012) Analysis of the dynamics of a delay system modeling a longitudinal flight, ICNPAA - 2012, ed. S. Sivasundaram, American Institute of Physics Proceedings 1493, p. 854-858, ISBN 978-0-7354-1105-0 .
5. M. Stoia-Djeska, C. A. Safta, A. Halanay, C. Petrescu (2012), Senzitivity Analysis of Eigenvalues for an Electro-Hydraulic Servomechanism, ICNPAA - 2012, ed. S. Sivasundaram, American Institute of Physics Proceedings1493, p. 977-982, ISBN 978-0-7354-1105-0 .
6. A. Halanay (2009), Periodic Solutions in Mathematical Models for Hematological Diseases Under Treatment, IEEE Proceedings of the 8th IFAC Workshop on Time-Delay Systems, Sept. 1-3, 2009, Sinaia, Romania.
7. A. Halanay, F. Ursu, I. Ursu, S. Balea (2007), Geometric control in a regulator problem for electrohydraulic servos, IEEE Proceedings of the 15-th Mediterranean Conference on Control and Automation, Atena, 27-29 iunie
8. A. Halanay, C. A. Safta (2000), Analysis of electrohydraulic follow-up systems: an analitical approach, Fifth International Conference on Hydraulic Machinery and Hydrodynamics, Timisoara, p. 97-102.

RESEARCH GRANTS-Director

1. Studiul calitativ al ecuatiilor diferentiale cu argument deplasat cu aplicatii la modelarea si simularea tratamentului in leucemii, CNCS, PN II-ID-PCE-3-0198, 2011-2014.
2. Stability and control for ordinary differential equations and for delay differential equations with applications in biology and engineering, CNCSIS 84, 2007, 2008.

3. Stability, bifurcations and control: qualitative aspects in the study of some nonlinear models from engineering, biology and economy, CNCSIS 280, 2005, 2006.
4. Stability, bifurcations and control for delay differential equations in models of population dynamics, Romanian-French grant in the “Brancusi”programme., 2005, 2006.