



Hakan Kalkan, Ph.D. Assistant Professor of Manufacturing Engineering

Atılım University
Department of Manufacturing Engineering
06830 İncek, Gölbaşı, Ankara/TURKEY
hakan.kalkan@atilim.edu.tr

Tel: +90 312 586 88 63

PERSONAL

Date of Birth	01-03-1985
Place of Birth	Kalecik-Ankara

EDUCATION

2011-2017	Atılım University, Manufacturing Engineering, Ph.D.	
2008-2011	Atılım University, Manufacturing Engineering, M.S.	
2002-2007	Süleyman Demirel University, Mechanical Engineering, B.S.	

ACADEMIC POSITIONS

10/10/Emile 1 Controlle		
10/2020-	Asst. Prof. Dr., Department of Manufacturing Engineering, Atilim University, Turkey	
09/2017-10/2020	Instructor Dr., Department of Manufacturing Engineering, Atilim University, Turkey	
10/2009-09/2017	Research Asistant, Department of Manufacturing Engineering, Atilim University, Turkey	

ADMINISTRATIVE DUTIES

09/2022-	Director, Metal Forming Center of Exellence, Atilim University, Turkey	
10/2017-09/2022	Vice Chair, Department of Manufacturing Engineering, Atilim University, Turkey	

RESEARCH INTERESTS

1	Metal Forming	
2	Manufacturing Processes	
3	Mechanical Material Characterization	
4	Fribology	
5	Finite Element Simulations	
6	Computer Aided Design / Computer Aided Manufacturing	
7	Die Design for Sheet Metal Forming	
8	Friction Stir Welding	

PROFESSIONAL SERVICE

4		Asistant Editor, Journal of Mechanical Design and Production-MATİM
1	https://dergipark.org.tr/tr/pub/matim	

PUBLICATIONS

1	H. Kalkan, T. Hacaloglu, B. Kaftanoglu, Experimental Investigation of Friction in Deep Drawing, The International Journal of Advanced Manufacturing Technology, 2017, 1433-3015, 92, 9, 33113318	
2	H. Kalkan, T. Hacaloglu, B. Kaftanoglu, Sac Sekillendirme Isleminde Sürtünmenin Incelenmesi, Makina Tasarım ve Imalat Dergisi, 2016, 1302-9487, 14, 2, 88-94.	
3	C. M. Sengönül, İ. Durgun, N. Dökmetas, H. Kalkan, B. Kaftanoglu, Bor Nitrür Kaplamanın, Kaynak Çapaklarının Metal Aparat Yüzeylerine Yapısma Davranıslarına Etkisi, Makina Tasarım ve İmalat Dergisi, 2016, 1302-9487, 14, 1, 22-30.	
4	Kalkan H. Alüminyum Ekstrüzyonu Üzerine Sayısal ve Deneysel Bir İnceleme. Makina Tasarım ve İmalat Dergisi. 2018; 16(2): 60-65.	

PROJECTS

1	Investigation of Friction in Sheet Metal Forming Atılım University Internal Support Program: ATÜ-BAP-A-1213-06 (Researcher, 03/2013-03/2015)	
2	Development of Laminated Dies for Prototyping Manufacturing Tubitak 1505 - University – Industry Collaboration Support Program (Researcher, 01/03/2016 - 01/12/2017)	
3	Determination of Coefficient of Friction in Deep Drawing of Steel under Hot Conditions Atılım University Internal Support Program: (ATÜ-BAD-1819-01 (Principal Investigator, 12/2018 - 03/2020)	
4	Coating of surgical needles with BN (boron nitride) and research on their medical performances The University-Industry cooperation support program: ATÜSAD-2022-03 (Researcher, 12/2021 - 12/2022)	
5	Rigid Sheet Metal Structural Part Design Optimization Industry Cooperation Program: TAI-TM1011 (Researcher, 03/2022 - 09/2023)	

PATENTS

1	Prototip İmalatına Yönelik Değişken Ölçülendirilebilir Kalıp Seti. 2017/22346	
2	Prototip İmalata Yönelik Modüler Kalıp Seti. 2017/22361	

CONFERENCE PRESENTATIONS

1	H. Kalkan, Y. Ugurlu, S. S. Erdönmez, B. Baranoglu, V. Çorumlu, B. Bilgin, C. Mermer, İ.Durgun, "Sheet Laminated Dies: An Alternative To Fast Prototyping
'	In Forming of Sheet Metal Parts, The 17th International Conference on
	Machine Design And Production, July 12 - July 15 2016, Bursa Türkiye.
2	Y. Uğurlu, H. Kalkan, B. Baranoğlu, S. S. Erdönmez, İ. Durgun, "An
	Alternative Rapid Prototyping Tooling for Sheet Metal Products", 1st
	International Conference of Advanced Materials and Manufacturing
	Technologies (ICAMT'17) 25-27 October 2017, Safranbolu, Karabuk, Türkiye.
2	M. Şengönül, H. Kalkan, Ö. Öğretmen, K. İnam, V.B. Oktay, U.T. Çubukçu, Y.
	Tunç, "Utilization of 3d Printing Technology for Model Forming in Investment
3	Casting of Sn For Sculpture Applications As a Case Study", 3rd International
	Congress on 3rd Printing Technologies and Digital Industry, Antalya, Türkiye.

4	M. Şengönül, H. Kalkan, T. Akış, B. Bağcı, K. İnam, Ö. Öğretmen, A. Aydoğan, "Design and Manufacture of a Portable Roller Bender Machine for Bicycle Rims", The 18th International Conference on Machine Design And Production, July 3 - July 6 2018, Eskişehir, Türkiye.	
5	E. Aksu, F. Işık, H. Yücel, Ç. Atlıhan, H. Kalkan, Design and Manufacture of a Fatigue Test Machine, The 19th International Conference on Machine Design and Production August 31- September 3 2022, Cappadocia, Türkiye.	
6	M. Somay, H. Kalkan, Derin Çekme İşleminde Yağlayıcı Performansının İncelenmesi, 10. Uluslararası Mühendislik ve Teknoloji Yönetimi Kongresi, 14-15 Ekim 2023, İstanbul, Türkiye	
7	Ç. Ceylan, K. Küçüköztaş, H. Kalkan, Optimizing Rubber Pad Forming: A Study on Stainless Steel and Aluminum, The 20th International Conference on Machine Design and Production August 14 - August 17 - 2024, Ankara, Türkiye.	
8	E. Toruk, B. Kaftanoğlu, H. Kalkan, Rijit Saç Metal Yapısal Parça Tasarımı Optimizasyonu, The 20th International Conference on Machine Design and Production August 14 - August 17 - 2024, Ankara, Türkiye.	
10	B. Sezer, H. Kalkan, B.B. Kentel, Design and Implementation of a Sampling System for Solid Flow on Conveyor Belts in Industry, The 20th International Conference on Machine Design and Production August 14 - August 17 - 2024, Ankara, Türkiye.	

CITATIONS

Sum of times cited without self-citations (ISI Web of Science):	7
H-index (ISI Web of Science):	1

COURSES GIVEN

1	ME108 - Computer Aided Solid Modelling
2	ME316 - Machine Elements
3	ME411 - Metal Forming
4	ME413 - Tool and Die Design

THESES SUPERVISED

1	B. Doğan MS Thesis, Performance Evaluation of Boron Nitride Coated Cutting
	Tools, September 2021 (Co-Advisor)
2	E. Toruk, MS Thesis, Structural Part Design Optimization of Rigid Sheet
	Metal, December 2023 (Co-Advisor)
3	M. Somay MS Thesis, Investigation of friction in deep drawing under different
	tribological conditions, January 2024
4	B. Sezer MS Thesis, Design and Implementation of a Sampling System for
	Solid Flow on Conveyor Belts in Industry, January 2024.