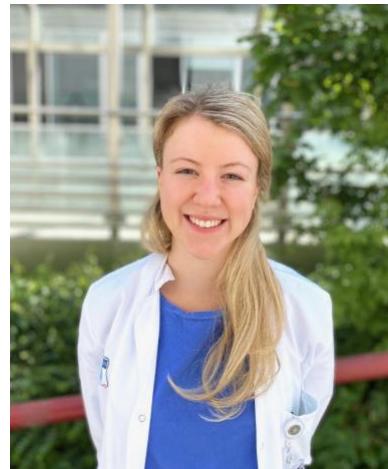


## Dr.med. univ. Theresa-Marie Dachs, PhD



### CURRICULUM VITAE

#### SCIENTIFIC AND RESEARCH ACTIVITIES

- 04/2022 - **Medical University of Vienna, Austria**  
**Department of Radiology and Nuclear Medicine**  
  
**Research Group of Assoc.Prof. Priv.-Doz. Dr. Martin Funovics:**  
Cardiovascular Imaging and Endovascular Aortic Therapy
- 04/2019 – 12/2023 **Medical University of Vienna, Austria**  
**Department of Internal Medicine II, Division of Cardiology**  
  
**PhD (N094) under supervision of**  
**Assoc.Prof. Priv.-Doz. Dr. Diana Bonderman**  
„Evaluation of the pharmacodynamic effects of riociguat in subjects with pulmonary hypertension and heart failure with preserved ejection fraction in a randomized, double-blind, placebo-controlled, parallel-group, multicenter study“
- 05/2018 – 03/2022 **Medical University of Vienna, Austria**  
**Department of Internal Medicine II, Division of Cardiology**  
  
Specialized outpatient clinic for hypertrophic cardiomyopathy  
(DDr. Daniel Dalos)
- 09/2018 – 03/2022 **Medical University of Vienna, Austria**  
**Department of Internal Medicine II, Division of Cardiology**  
  
Specialized outpatient clinic for HFpEF and cardiac amyloidosis  
(Ass.Prof. Dr. Johannes Kastner)

#### Clinical Education

- 12/2022 - ongoing **Medical University of Vienna, Austria**  
**Department of Radiology and Nuclear Medicine**

- Resident
- 04/2022 – 11/2022      **Klinik Floridsdorf, Vienna, Austria**  
Department of Cardiac and Vascular Surgery  
Department of Cardiology  
- Basic Training
- 01/2022 – 03/2022      **Medical University of Vienna, Austria**  
**Department of Internal Medicine II, Division of Cardiology**  
- Basic Training

### Medical Education

- 2012 – 2019      **Medical University of Vienna – Human Medicine (N202)**
- 2016 – 2019      Diploma Thesis at the Department of Internal Medicine II, Division of Cardiology under supervision of Univ. Prof. Dr. Irene Lang  
„Neoangiogenesis in Pulmonary Arterial Hypertension”
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### Research Interests:

1. Endovascular aortic therapy
2. Cardiovascular imaging
3. Heart failure with preserved ejection fraction (HFpEF)
4. Hypertrophic cardiomyopathy
5. Cardiac amyloidosis
6. Pulmonary hypertension

### Awards

1. **Theodor-Billroth-Preis 2023**, awarded by the Viennese Medical Chamber for *Riociguat in pulmonary hypertension and heart failure with preserved ejection fraction: the haemoDYNAMIC trial, published in the European Heart Journal in July 2022.*
2. **Researcher of the Month (November 2023)**, awarded by the Medical University of Vienna/Austria for *Riociguat in pulmonary hypertension and heart failure with preserved ejection fraction: the haemoDYNAMIC trial, published in the European Heart Journal in July 2022.*

### Other

#### Voluntary Work

- Austrian Medical Students Association (AMSA)
- Local President Vienna (2014-2015)
  - Vice President for Internal Affairs, national executive board (2015-2016)

#### Language Skills

- German: native
- English: fluent, experience in clinical settings
- French: fluent, experience in clinical settings
- Latin: intermediate certificate (4 years)

## Publications

### *First Authorships:*

1. **Dachs TM, Hauck SR, Kern M, Klausenitz C, Hoffner M, Schernthaner M, Abdel-Rahman H, Hannover A, Strassl A, Steiner I, Loewe C, Funovics MA.** *In-Stent Restenosis in Peripheral Arterial Disease: Ultra-High-Resolution Photon-Counting Versus Third-Generation Dual-Source Energy-Integrating Detector CT Phantom Study in Seven Different Stent Types.* *Cardiovascular and Interventional Radiology.* Accepted 2024 Oct (IF: 2.9)
2. **Dachs TM, Duca F, Rettl R, Binder-Rodriguez C, Dalos D, Camuz Ligios L, Kammerlander A Grünig E, Pretsch I, Steringer-Mascherbauer R, Ablasser K, Wargenau M, Mascherbauer J, Lang IM, Hengstenberg C, Badr-Eslam R, Kastner J, Bonderman D.** *Riociguat in pulmonary hypertension and heart failure with preserved ejection fraction: the haemoDYNAMIC trial.* *European Heart Journal.* 2022 Jul (IF: 35.855).
3. **Dachs TM, Hauck SR, Kern M, Klausenitz C, Funovics M.** *Fenestrierte und verzweigte endovaskuläre Aortenprothesen – ein Update.* *Der Radiologe.* 2022 Jun (IF: 0.635).

### *Co-Authorships:*

1. **Poledniczek M, Kronberger C, Willixhofer R, Ermolaev N, Cherouny B, Dachs TM, Rettl R, Binder-Rodriguez C, Camuz Ligios L, Gregshammer B, Kammerlander AA, Kastner J, Bergler-Klein J, Duca F, Badr Eslam R.** *Health-related quality of life is an independent predictor of mortality and hospitalisations in transthyretin amyloid cardiomyopathy: a prospective cohort study.* *Qual Life Res.* 2024 Oct (IF: 3.3).
2. **Hauck SR, Dachs TM, Kern M, Eilenberg W, Müller-Wille R, Fezoulidis N, Hausegger K, Heurteur G, Gschwendtner M, Neumayer C, Loewe C, Funovics MA.** *Preliminary results of the austrian national registry with the novel iCover bridging stentgraft in fenestrated endovascular aortic repair.* *Asian J Surg.* 2024 Apr (IF: 2.8).
3. **Duca F, Rettl R, Kronberger C, Binder C-Rodriguez, Mann C, Dusik F, Schrutka L, Dalos D, Öztürk B, Dachs TM, Cherouny B, Camuz Ligios L, Agis H, Kain R, Koschutnik M, Donà C, Badr-Eslam R, Kastner J, Beitzke D, Loewe C, Nitsche C, Hengstenberg C, Kammerlander AA, Bonderman D.** *Myocardial structural and functional changes in cardiac amyloidosis: insights from a prospective observational patient registry.* *Eur Heart J Cardiovasc Imaging.* 2023 Dec (IF: 6.2).
4. **Rettl R, Wollenweber T, Duca F, Binder-Rodriguez C, Cherouny B, Dachs TM, Camuz Ligios L, Schrutka L, Dalos D, Beitzke D, Loewe C, Badr Eslam R, Kastner J, Hacker M, Bonderman D.** *Monitoring tafamidis treatment with quantitative SPECT/CT in transthyretin amyloid cardiomyopathy.* *Eur Heart J Cardiovasc Imaging.* 2023 Jul (IF: 6.2).
3. **Kern M, Hauck SR, Dachs TM, Haider L, Stelzmüller ME, Ehrlich M, Loewe C, Funovics MA.** *Endovascular repair in type A aortic dissection: Anatomic candidacy for currently manufactured stentgrafts and conceptual valve-carrying devices for an Endo-Bentall procedure.* *Eur J Cardiothorac Surg.* 2023 Mar (IF: 4.534).
4. **Kronberger C, Mousavi RA, Öztürk B, Willixhofer R, Dachs TM, Rettl R, Camuz-Ligios L, Rassoulpour N, Krall C, Litschauer B, Badr Eslam R.** *Functional capacity testing in patients with pulmonary hypertension (PH) using the one-minute sit-to-stand test (1-min STST).* *PLoS One.* 2023 Mar (IF: 3.7).

5. Kupferthalter A, Hauck SR, Schwarz M, Kern M, Deinsberger J, **Dachs TM**, Haider L, Klausenitz C, Neumayer C, Stelzmüller ME, Ehrlich M, Loewe C, Funovics MA. Endovascular repair of penetrating thoracic aortic ulcers using tubular stent grafts versus stent grafts with a proximal scallop. *Jour Endovasc Ther.* 2023 Jan (IF: 3.089).
6. Schrutka L, Seirer B, Rettl R, **Dachs TM**, Binder-Rodriguez C, Duca F, Dalos D, Badr-Eslam R, Kastner J, Hengstenberg C, Frommlet F, Bonderman D. Heart failure with preserved ejection fraction: Calculating the risk of future heart failure events and death. *Front. Cardiovasc. Med.* 2022 Oct (IF: 6.050).
7. Rettl R, Duca F, Binder-Rodriguez C, **Dachs TM**, Cherouny B, Camuz Ligios L, Mann C, Schrutka L, Dalos D, Charwat-Resl Silvia, Baddr Eslam R, Kastner J, Bonderman D. Impact of tafamidis on myocardial strain in transthyretin amyloid cardiomyopathy. *Amyloid.* 2022 Oct (IF: 4.048).
8. Hauck SR, Kern M, **Dachs TM**, Haider L, Stelzmüller ME, Ehrlich M, Loewe C, Funovics MA. Applicability of endovascular branched and fenestrated aortic arch repair devices to treat residual type A dissection after ascending replacement. *Journal of Vascular Surgery.* 2022 Aug (IF: 4.268).
9. Badr Eslam R, Öztürk B, Rettl R, Capelle C, Qin H, Binder C, **Dachs TM**, Camuz Ligios L, Duca F, Dalos D, Schrutka L, Alasti F, Kastner J, Vila G, and Bonderman D. Impact of tafamidis and optimal background treatment on physical performance in patients with transthyretin amyloid cardiomyopathy. *Circulation: Heart failure.* 2022 Jul (IF: 8.790).
10. Hauck SR, Schernthaner R, **Dachs TM**, Kern M, Funovics M. Endovaskuläre Aortenreparatur bei Endoleaks: Diagnose, Behandlung und Ergebnisse. *Der Radiologe.* 2022 Jun (IF: 0.635).
11. Kronberger C, Mousavi RA, Öztürk B, **Dachs TM**, Rettl R, Camuz-Ligios L, Litschauer B, Badr-Eslam R. Exercise capacity assessed with the one-minute sit-to-stand test (1-min STST) and echocardiographic findings in patients with heart failure with preserved ejection fraction (HFpEF). *Heart & Lung.* 2022 Sep (IF: 3.149).
12. Dalos D, **Dachs TM**, Gatterer C, Schneider M, Binder T, Bonderman D, Hengstenberg C, Panzer S, Aschauer S. Cardiac remodeling in ambitious endurance-trained amateur athletes older than 50 years - an observational study. *PLOS One.* 2022 Apr (IF: 3.752).
13. Hauck SR, Eilenberg W, Kupferthalter A, Kern M, **Dachs TM**, Wressnegger A, Neumayer C, Loewe C, Funovics MA. Use of a steerable sheath for completely femoral access in branched endovascular aortic repair compared to upper extremity access. *Cardiovascular and Interventional Radiology.* 2022 Apr (IF: 2.740).
14. Rettl R, Mann C, Duca F, **Dachs TM**, Binder C, Camuz Ligios L, Schrutka L, Dalos D, Koschutnik M, Donà C, Kammerlander A, Beitzke D, Loewe C, Charwat-Resl S, Hengstenberg C, Kastner J, Badr Eslam R, Bonderman D. Tafamidis treatment delays structural and functional changes of the left ventricle in patients with transthyretin amyloid cardiomyopathy. *Eur Heart J Cardiovasc Imaging.* 2021 Nov (IF: 6.875).
15. Agibetov A, Kammerlander A, Duca F, Nitsche C, Koschutnik M, Dona C, **Dachs TM**, Rettl R, Stria A, Schrutka L, Binder C, Kastner J, Agis H, Kain R, Auer-Grumbach M, Samwald M, Hengstenberg C, Dorffner G, Mascherbauer J, Bonderman D. Convolutional neural networks for fully-automated diagnosis of cardiac amyloidosis by cardiac magnetic resonance imaging. *Journal of Personalized Medicine.* 2021 Nov (IF: 4.945).

16. Schrutka L, Anner P, Agibetov A, Seirer B, Dusik F, Rettl R, Duca F, Dalos D, **Dachs TM**, Binder C, Badr-Eslam R, Kastner J, Beitzke D, Loewe C, Hengstenberg C, Laufer G, Stix G, Dorffner G, Bonderman D. Machine learning-derived electrocardiographic algorithm for the detection of cardiac amyloidosis. *Heart (British Cardiac Society)*. 2021 Oct (IF: 5.994).
17. Binder C, Poglitsch M, Duca F, Rettl R, **Dachs TM**, Dalos D, Schrutka L, Seirer B, Camuz Ligios L, Capelle C, Badr-Eslam R, Qin H, Hengstenberg C, Bonderman D. Renin Feedback Is an Independent Predictor of Outcome in HFpEF. *Journal of Personalized Medicine*. 2021 May (IF: 4.945).
18. Rettl R, **Dachs TM**, Duca F, Binder C, Dusik F, Seirer B, Schönauer J, Kronberger C, Camuz-Ligios L, Hengstenberg C, Derkits N, Kastner J, Badr-Eslam R, Bonderman D. What type of patients did PARAGON-HF select? Insights from a Real-World Prospective Cohort of Patients with Heart Failure and Preserved Ejection Fraction. *J Clin Med*. 2020 Nov (IF: 4.242).
19. Binder C, Duca F, Binder T, Rettl R, **Dachs TM**, Seirer B, Camuz-Ligios L, Dusik F, Capelle C, Qin H, Agis H, Kain R, Hengstenberg C, Badr-Eslam R, Bonderman D. Prognostic implications of pericardial and pleural effusion in patients with cardiac amyloidosis. *Clinical Research in Cardiology*. 2020 Sep (IF: 5.460).
20. Agibetov A, Seirer B, **Dachs TM**, Koschutnik M, Dalos D, Rettl R, Duca F, Schrutka L, Agis H, Kain R, Auer-Grumbach M, Binder C, Mascherbauer J, Hengstenberg C, Samwald M, Dorffner G, Bonderman D. Machine Learning Enables Prediction of Cardiac Amyloidosis by Routine Laboratory Parameters: A Proof-of-Concept Study. *J Clin Med*. 2020 May (IF: 4.242).
21. Badr-Eslam R, Öztürk B, Panzer S, Qin H, Duca F, Binder C, Rettl R, **Dachs TM**, Alasti F, Vila G, Bonderman D. Low serum potassium levels and diabetes - An unfavorable combination in patients with heart failure and preserved ejection fraction. *Int J Cardiol*. 2020 May (4.164).
22. Duca F, Snidat A, Binder C, Rettl R, **Dachs TM**, Seirer B, Camuz-Ligios L, Dusik F, Capelle CDJ, Hong Q, Agis H, Kain R, Mascherbauer J, Hengstenberg C, Badr Eslam R, Bonderman D. Hemodynamic Profiles and Their Prognostic Relevance in Cardiac Amyloidosis. *J Clin Med*. 2020 Apr (IF: 4.242).
23. Kofler M, Reinstadler SJ, Mayr A, Stastny L, Reindl M, Dumfarth J, **Dachs TM**, Wachter K, Rustenbach CJ, Friedrich G, Feuchtner G, Klug G, Bramlage P, Metzler B, Grimm M, Baumbach H, Bonaros N. Prognostic implications of psoas muscle area in patients undergoing transcatheter aortic valve implantation. *Eur J Cardiothorac Surg*. 2019 Feb (IF: 3.847).
24. Winter MP, Alimohammadi A, **Dachs T**, Altmann J, Panzenboeck A, Redwan B, Sibilia M, Santer D, Nagel F, Todesser B, Lang IM. A new experimental model of pulmonary arterial hypertension – KDR knock out. *Wiener klinische Wochenschrift*. 2016 May (IF: 1.170).