

Meta-Analyses of the Effect of Self-Regulated Learning Interventions on Self-Regulated Learning and Achievement

Citation for published version (APA):

Jansen, R. S., Van Leeuwen, A., Janssen, J., & Kester, L. (2017). *Meta-Analyses of the Effect of Self-Regulated Learning Interventions on Self-Regulated Learning and Achievement*. Poster session presented at 21st Junior Researchers of Earli Conference for Research on Learning and Instruction, Tampere, Finland.

Document status and date:

Published: 01/08/2017

Document Version:

Peer reviewed version

Document license:

CC BY-NC-SA

Please check the document version of this publication:

- A submitted manuscript is the version of the article upon submission and before peer-review. There can be important differences between the submitted version and the official published version of record. People interested in the research are advised to contact the author for the final version of the publication, or visit the DOI to the publisher's website.
- The final author version and the galley proof are versions of the publication after peer review.
- The final published version features the final layout of the paper including the volume, issue and page numbers.

[Link to publication](#)

General rights

Copyright and moral rights for the publications made accessible in the public portal are retained by the authors and/or other copyright owners and it is a condition of accessing publications that users recognise and abide by the legal requirements associated with these rights.

- Users may download and print one copy of any publication from the public portal for the purpose of private study or research.
- You may not further distribute the material or use it for any profit-making activity or commercial gain
- You may freely distribute the URL identifying the publication in the public portal.

If the publication is distributed under the terms of Article 25fa of the Dutch Copyright Act, indicated by the "Taverne" license above, please follow below link for the End User Agreement:

<https://www.ou.nl/taverne-agreement>

Take down policy

If you believe that this document breaches copyright please contact us at:

pure-support@ou.nl

providing details and we will investigate your claim.

Downloaded from <https://research.ou.nl/> on date: 09 Feb. 2023

Open Universiteit
www.ou.nl



Meta-Analyses of the Effect of Self-Regulated Learning Interventions on Self-Regulated Learning and Achievement

Renée S. Jansen, Anouschka van Leeuwen, Jeroen Janssen, & Liesbeth Kester

Department of Education and Pedagogy – Education, Faculty of Social and Behavioral Sciences, Utrecht University, The Netherlands

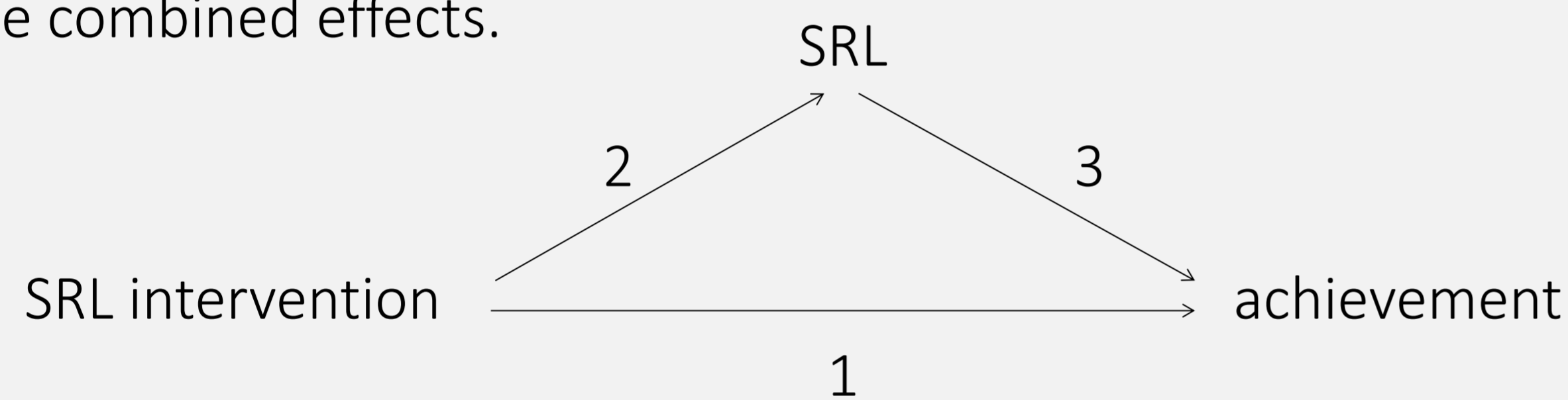
Introduction

Self-regulated learning (SRL) processes are initiated by the individual to acquire knowledge and skills (Zimmerman, 2015). SRL processes include metacognitive (e.g., planning, goal setting) and resource management (e.g., time management, help seeking) activities. Higher levels of SRL are known to be related to better performance (Pintrich & de Groot, 1990).

Previous meta-analyses have shown significant relationships between SRL interventions and use of SRL strategies and between SRL interventions and achievement (e.g., Boer, Donker-Bergstra, Kostons, & Korpershoek, 2013; Dignath & Büttner, 2008). The effects of SRL interventions on SRL and achievement have however never been synthesized and combined with results on the relation between SRL and achievement.

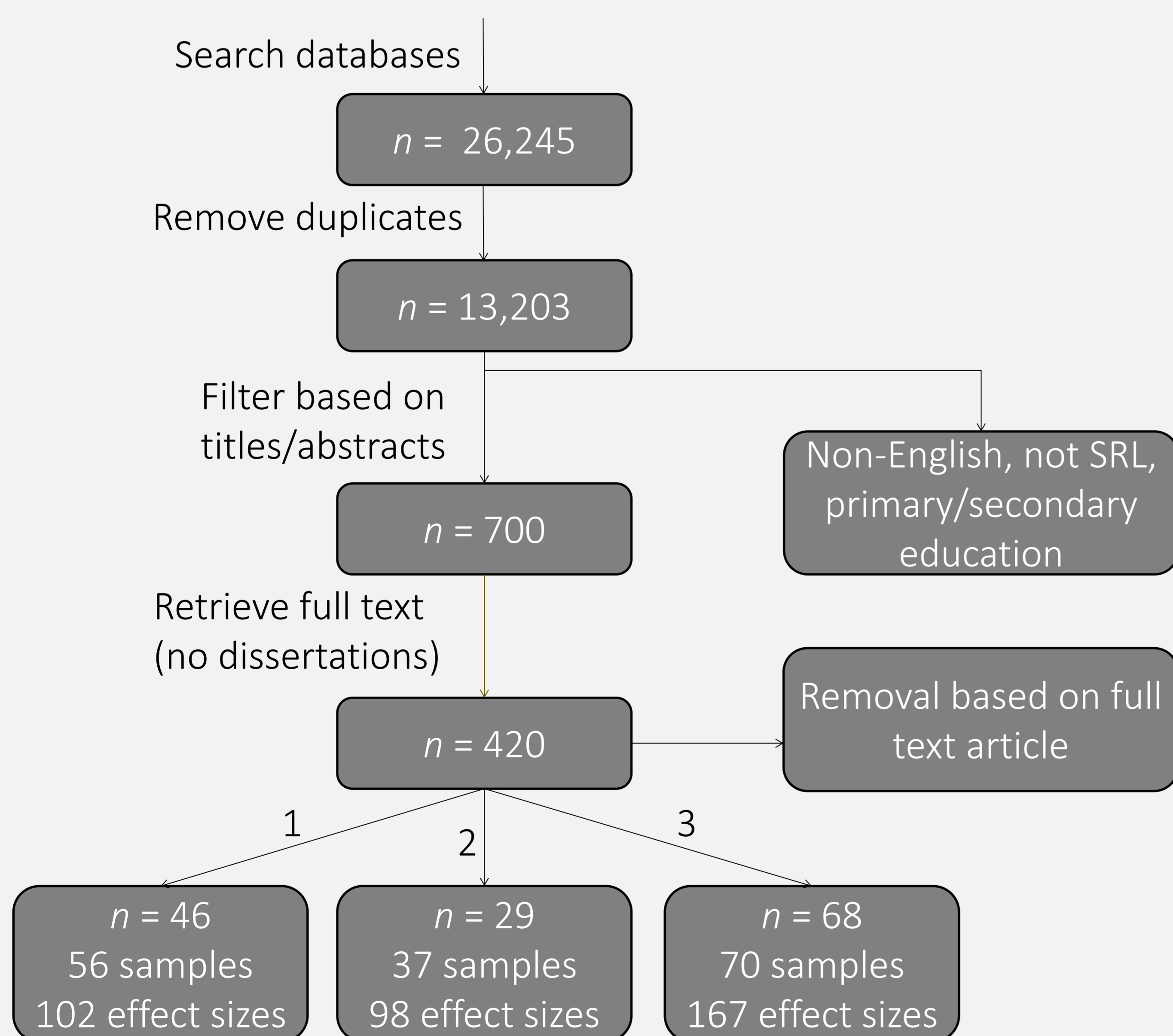
Research questions

In the present research study we aim to analyze the effects of specific SRL interventions on SRL and achievement. By conducting three meta-analyses simultaneously, variables are operationalized and coded in the same manner for each relationship. Analyses may therefore be conducted on the three relations simultaneously, allowing for conclusions to be drawn on the combined effects.



1. The effect of SRL interventions on achievement.
2. The effect of SRL interventions on SRL.
3. The effect of SRL on achievement.

Method (literature search)



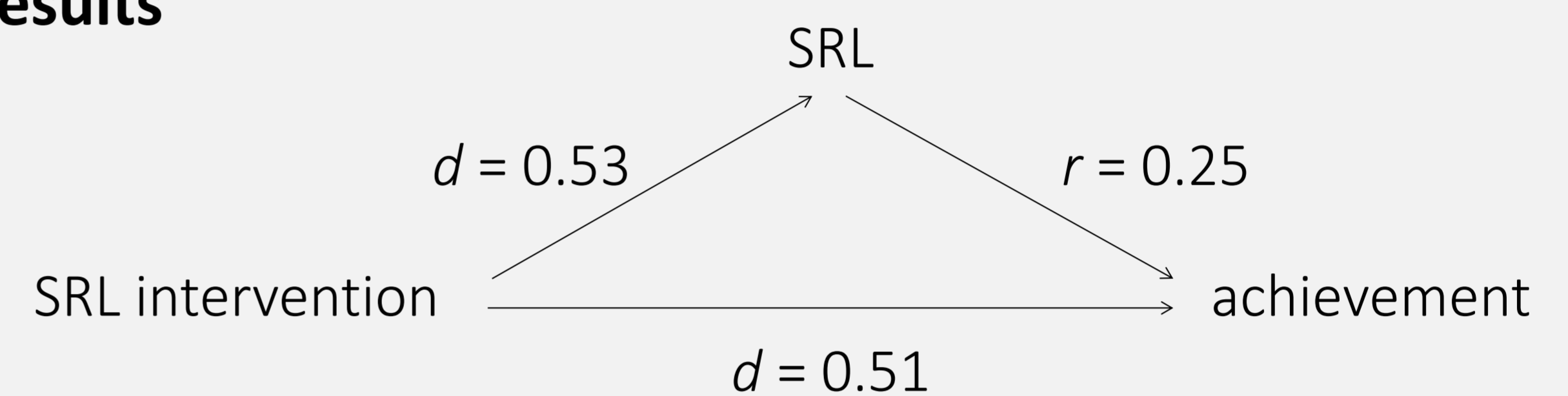
Note. Studies may contain multiple relations and multiple effect sizes.

Method (coding)

For each study included in the review, six aspects are coded:

(1) General study information	(2) Educational context	(3) Sample characteristics
(4) SRL intervention (e.g., • length • integration with learning context • type of SRL supported	(5) SRL measurement (e.g., • type of measure • reliability • type of SRL measured	(6) Achievement • type of achievement measure

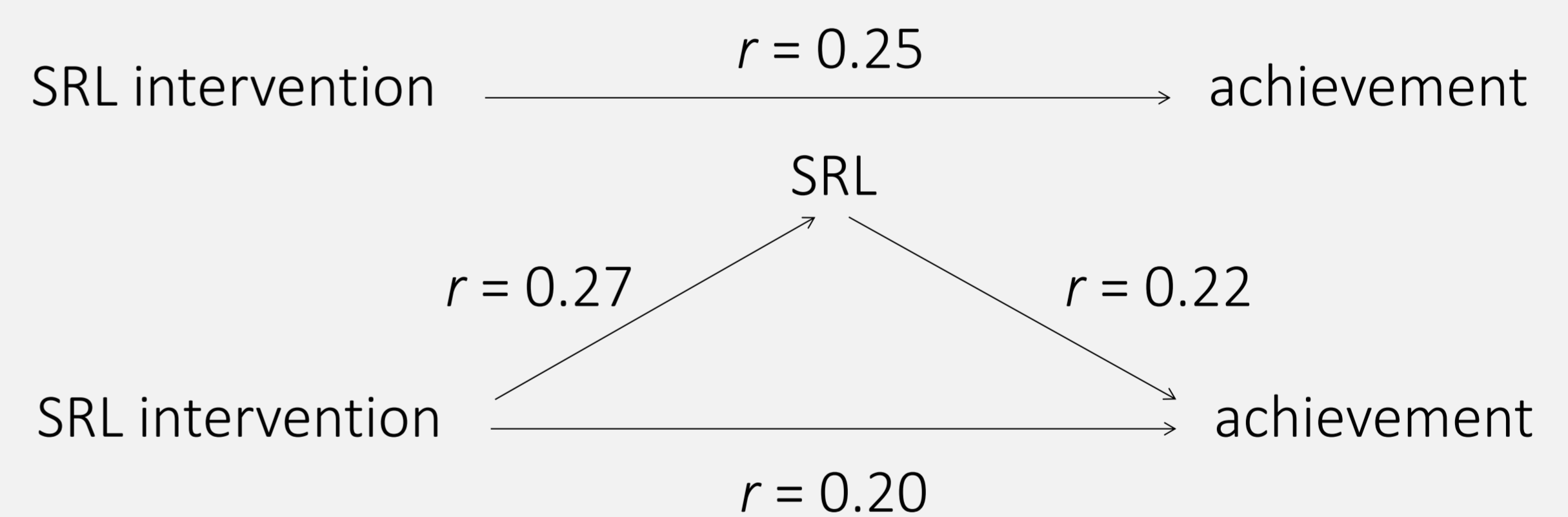
Results



Moderator analysis is in progress. For the intervention characteristics, significant moderators are:

- The timing of the intervention in relation to the course.
- The type of SRL supported.

Meta-Analytic Structural Equation Modelling (MASEM): mediation analysis



Conclusions

- SRL interventions have a medium effect on both SRL and achievement. There is also a medium correlation between SRL and achievement.
- The effect of SRL interventions on achievement is only partially mediated through SRL.
- Specific intervention characteristics moderate the effectiveness of the interventions, including the type of SRL support.

References

- Boer, H. de, Donker-Bergstra, A. S., Kostons, D. D. N. M., & Korpershoek, H. (2013). *Effective strategies for self-regulated learning: a meta-analysis*. Groningen: GION/RUG.
- Dignath, C., & Büttner, G. (2008). Components of fostering self-regulated learning among students. A meta-analysis on intervention studies at primary and secondary school level. *Metacognition and Learning*, 3(3), 231–264.
- Pintrich, P. R., & de Groot, E. V. (1990). Motivational and self-regulated learning components of classroom academic performance. *Journal of Educational Psychology*, 82(1), 33–40.
- Zimmerman, B. J. (2015). Self-Regulated Learning: Theories, Measures, and Outcomes. In *International Encyclopedia of the Social & Behavioral Sciences* (pp. 541–546). Elsevier.