An Investigation of Students´ Motivation to Pursue Higher Education at a Czech University

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Aims. The aim of this paper was to **investigate the type of motivation** leading students to pursue higher education, and to **describe the adaptation** of the modified version of the **Academic Motivation Scale** (Vallerand et al., 1989). This seven-point, 28-item Likert-scale was designed to assess self-determination continuum and the types of motivation with their regulatory styles.

Participants. The research pool consisted of **467 university students** in regular classroom settings enrolled at a Czech university. The mean age of the sample was 22.25 (*SD* = 1.7) and ranged from 19 to 29 years (Table 1).

Procedure. (1) An exploratory factor analysis (EFA) was used to explore the latent factor structure. The principal component analyses with the Varimax rotation was used with items loading over .30. The internal consistency was checked using Cronbach's alpha and item-total correlations.

Table 1. Demographic characteristics of the sample (n = 467)

	Gender		Age		Year of study					Field of study			
Frequency	Male	Female	19-21 years	22-29 years	1st year Bc	2nd year Bc	3rd year Bc	1st year Mgr	2nd year Mgr	Social Educ.	Healthcare	Philology	Preschool T.
n	29	438	184	278	149	150	86	39	43	177	109	55	126
%	6.2	93.8	39.4	59.5	31.9	32.1	18.4	8.4	9.2	37.9	23.3	11.8	27.0

(2) Correlations among the motivation subscales (Figure 1) assessing the self-determined continuum and correlations with GPA to test the predictive validity of the scales were examined.

(3) The overall average motivation and influence of the selected variables, i.e., gender, age, year, and field of study.

Results.

In EFA a **4-factor model** was generated explaining 61% of the total variance. In this version the survey consisted of 16-items with Cronbach's α ranging from .82 to .60 and items falling into the appropriate factor. The only exception was item 5 ("Because I want to learn something new") from the intrinsic motivation – to know, falling into the identified regulation. The data proved a student's (F1) **IDR,** (F2) **ER,** (F3) **AM,** and (F4) **IM** to be strong predictors of students' motivation to pursue higher education. Czech students reported being **primarily motivated by IM**, representing self-determined regulation, meaning studying for their own purposes and the pleasure derived from it.

Table 2. Intercorrelations between the motivation scales and GPA

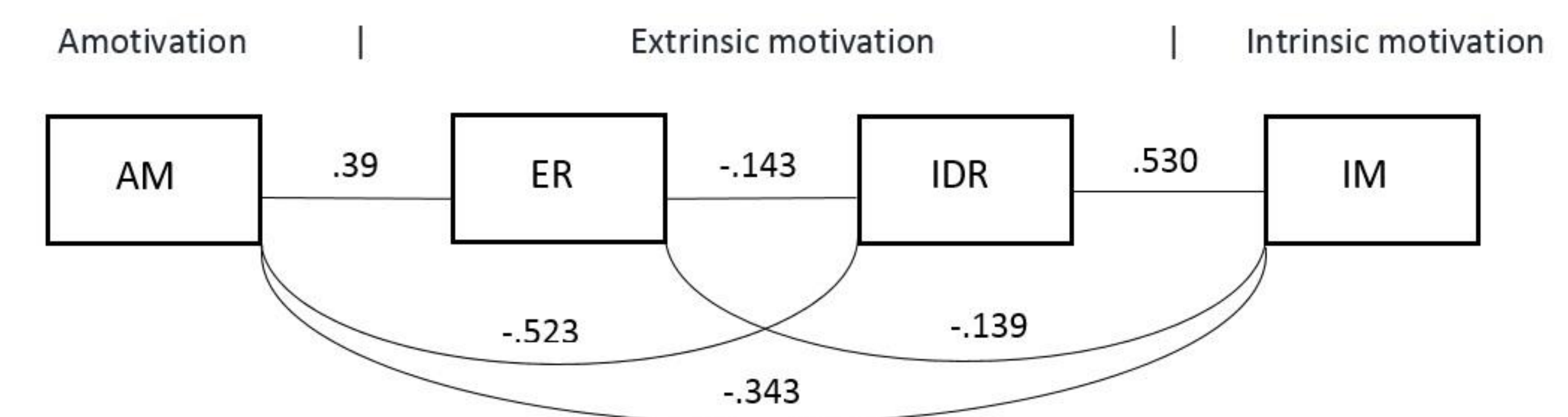| Subscale	Mean (SD)	IDR	ER	AM	IM
Identified regulation (IDR)	4.45 (1.44)	(5 items) .82			
External regulation (ER)	3.51 (1.32)	-.143**	(4 items) .67		
Amotivation (AM)	3.05 (1.39)	-.523**	.394**	(4 items) .74	
Intrinsic motivation (IM)	4.81 (1.18)	.530**	-.139**	-.343**	(3 items) .60
Grade point average (GPA)	1.95 (.606)	-.399**	.173**	.278**	-.242**

Note: Cronbach´s alphas are placed on diagonal.

Figure 2. Intercorrelations on the Self-Determination continuum

Two **deviations** from the expected correlations outcomes were found and should be highlighted (see Table 2).

(1) Amotivation showed a stronger negative correlation with identified regulation (-.523) than with intrinsic motivation (-.343), which is between these two subscales on the self-determined continuum (see Figure 2).

(2) Identified regulation showed stronger positive correlation with intrinsic motivation (.530) than with external regulation, falling into the same external motivation (-.143). Identified regulation itself was perceived by the Czech students as a part of intrinsic motivation rather than extrinsic motivation.

Figure 1. Self-Determination continuum of motivation with researched types of motivation highlighted (Modified from Deci & Ryan, 2002)

Table 3. Means differences for groups of students by selected variables

Subscales	Gender				Age				Year of study								Field of study						
	Male	Female	p-value	Effect Size (r)	19-21 years	22-29 years	p-value	Effect Size (r)	1st year Bc	2nd year Bc	3rd year Bc	1st year Mgr	2nd year Mgr	F-test	p-value	Effect Size (η^2)	Social Education	Healthcare	Philology	Preschool Teacher	F-test	p-value	Effect Size (η^2)
IDR	3.7	4.5	< .001	.15	4.5	4.5	.947	.00	4.8	4.0	4.5	4.7	4.6	21.3	< .001	.049	4.8	4.2	2.9	4.8	66.1	< .001	.178
ER	3.9	3.5	.081	.08	3.5	3.5	.385	.04	3.4	3.8	3.6	3.0	3.2	17.6	< .001	.030	3.3	3.9	4.2	3.2	41.5	< .001	.078
AM	3.9	2.9	< .001	.15	2.9	3.2	< .05	.10	2.6	3.3	3.3	2.9	3.1	21.3	< .001	.044	3.0	3.3	3.9	2.5	50.9	< .001	.099
IM	4.2	4.9	< .001	.12	4.8	4.8	.509	.03	4.8	4.7	4.9	4.9	4.7	3.5	.477	.006	4.9	4.8	4.4	4.9	6.29	.098	.020

Note: Bc = Bachelor's degree. Mgr = Master's degree. Means on 7-point Likert scale ranging from 1 (does not correspond at all) to 7 (corresponds exactly) are displayed.