

## **Development of a Motivation to Lead Scale**

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### **1. Introduction**

The realisation of Switzerland's most extensive army reform at the beginning of this year resulted in significant changes in the area of officer selection and training. Previously, future officers completed military basic training, NCO schooling and finally officer training, a total of 66 weeks of military education, spanning over a maximum of two years. In order to increase the attractiveness of an officer career, the training was shortened to one year. After only seven weeks of military basic training, future officers now cross over to a 15-week military leadership course. Subsequently they attend 19 weeks of officer schooling and complete their training with six weeks of formation drill.

This change in system means that the decision as to who will pursue a leadership career must be taken after only six weeks of military basic training. In order to assist school commanders in the decision-making process, one day assessments are held, following which successful candidates receive a recommendation for further training based on several tests, a presentation exercise and an interview with a member of the Psychological Services. The test battery includes several performance tests, an inventory on leadership qualities and a questionnaire on motivation to lead. The latter delivers two important pieces of information: As participants are selected for assessment by school commanders, several candidates take part involuntarily. The results of the questionnaire therefore facilitate the interpretation of the test results by the psychologist, in that he or she is already aware of whether or not a candidate is even interested in a leadership career at the time of the personal interview. Secondly, the respective scores in the ten sub-dimensions of the questionnaire reveal the main reasons for motivated candidates wishing to pursue a military leadership career.

### **2. Theoretical and empirical background**

As no previous studies have been conducted on the subject of motivation to lead in the Swiss Armed Forces, a new questionnaire had to be constructed from scratch. The author team<sup>1</sup> decided to pinpoint a suitable model of motivation to lead and adapt it to the specific leadership situation in the Swiss Armed Forces. A total of three sources built the foundation of the questionnaire construction:

1. The theory of motivation to lead from McClelland (1984) and Yukl (1990).
2. Results of a survey with army recruits on motivation to pursue a military leadership position.
3. Information gleaned from interviews with career officers.

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<sup>1</sup> The questionnaire was constructed as part of a thesis at the Institute of Psychology of Zurich University by Nicole Giauque and H el ene Michelle Vaso under the supervision of the first author, who would like to thank them for their contribution.

## 2.1 Theory of motivation to lead

The “theory of learned needs” from McClelland (1984), which builds on Murray’s work (1938), forms the basis and theoretical framework of the questionnaire. Together with other researchers, McClelland isolated from Murray’s list those human needs which in his opinion represented the three key needs in human existence: *need for achievement*, *need for power*, and *need for affiliation* (Yukl, 1990, pp. 42-45).

High *need for achievement* entails obtaining satisfaction from successfully accomplishing a difficult task, from attaining a standard of excellence or from improving the way of doing something. Typical of a strong *need for power* is obtaining great satisfaction in influencing people and arousing in them strong emotions, such as fear, awe, pleasure, anger and surprise. A strong *need for affiliation* is characterised by particular concern about being liked and accepted, taking great pleasure in social interactions with friends, such as parties, reunions or mutual recreational activities and enjoying teamwork.

In his book “skills for managers and leaders” Yukl (1990) supplements the list with three further needs:

A person with a strong *need for esteem* wishes to be respected and appreciated, solicits recognition for his talents and accomplishments, and assesses his own self-worth primarily by what others think of him. A high *need for security* comprises the likelihood of frequent worry about illness, accidents, job security or loss of income and therefore the avoidance of taking risky decisions for which the person could be held responsible. Typical is also the rigid observation of rules and regulations. A strong *need for independence*, on the other hand, implies the need for a great deal of freedom and autonomy in life and disconcertion when an authority figure attempts to impose restraints or restrictions on personal behaviour.

## 2.2 Results of the recruit survey

In order to incorporate the special situation of pursuing a Swiss military career in the questionnaire, participants at two military basic training schools were required to complete a short questionnaire, in which two open questions recorded personal reasons for and against the pursuit of a military leadership position. As this is an extremely delicate subject for the recruits because some of them are forced into NCO training against their will, a lot of nonsense was written, such as “cheap train trips”, “pleasure in the pointlessness of the army” or “inferiority complex”. Nevertheless, 114 questionnaires could be evaluated and 262 reasons were given for the pursuit of a military career, which gave good insight into the predominant motives. Table 1 shows the most frequently specified reasons for and against and table 2 shows the categories formed from these reasons.

Table 1: Most common reasons for and against the pursuit of a leadership position in the army in the opinion of recruits (number of references in percent)

Reasons for leadership training (Total: 262 references)		Reasons against leadership training (Total: 382 references)	
To earn money	20%	Private life, profession	37%
Management training	15%	No motivation, senselessness	29%
Contact to people	14%	Stress in the army	17%
Unemployment	13%	Low salary	7%

Table 2: Categorised reasons for the pursuit of a leadership position in the army in the opinion of recruits

Fitness and physical challenge	Staying power
Power and career	Respect
Friendship and contact	To earn money
Unemployment	Further education
Management training	National pride

### 2.3 Interviews with career officers

Using the categorised reasons gained from the survey of recruits, the authors produced guidelines to interview career officers as to the reasons for the pursuit of a leadership position in the military services. The aim of these interviews was the confirmation of the categories and the obtainment of further material for the formulation of items (critical incident technique). Career officers were selected as interview partners because they conduct several personal discussions with recruits in the course of leader selection and are therefore well-informed about their motives for a leadership career.

A total of 22 officers from nine different branches participated. The evaluation of the interviews confirms the above mentioned categories and reveals two further aspects: the goal of becoming a career officer or police officer (category “Profession”) and the motivating effect of positive role models (group leaders or platoon leaders) in the military basic training school (category “Social relationships”).

### 3. Item construction and verification

Based on the categories resulting from the survey and interviews, a preliminary version of the motivation to lead questionnaire was developed, which comprised 89 items and twelve dimensions. These were presented for completion to 402 recruits from five military basic training schools. They were requested to judge on a four category Likert scale (completely incorrect – completely correct) whether the individual statements would be personal reasons for pursuing an army career.

Items with low part-whole corrected item-total correlation were eliminated following item analysis. A further reduction of the number of items followed factor analysis, so that 38 items could be incorporated into seven clearly interpretable factors. For the most part McClelland’s and Yukl’s labels could be attributed to the factors, although slight variations in content had to be taken into account. The original categories and the factors confirmed by factor analysis are shown in table 3.

Table 3: Overview of the categories and dimensions of the two questionnaire versions

1 <sup>st</sup> version of the questionnaire	1 <sup>st</sup> version (factor analysis)	2 <sup>nd</sup> version of the questionnaire (factor analysis)
Physical performance “to improve physical fitness”	Performance	Performance
Psychical performance “to develop personality”		–
Power “possibility to wield power” “respect due to officer status”	Power	Power
		Respect
Friendship “to make friends”	Affiliation	Affiliation
Interest in people “to have contact to many people”		
Money “to earn money”	Security	Security
Tiding over “to tide oneself over for a while”		
Education “solid further educational possibilities”		–
Profession “military training is also useful in civil life”	–	Interest in military tasks
Leadership “to gain leadership experience”	Leadership	Leadership
Patriotism “to serve one’s country”	Patriotism	Patriotism
Social relationships “a military career is family tradition”	Support	Support for the military services
–	–	Independence “to be one’s own boss”

The second version of the questionnaire was extended by the dimension “Independence”, the dimension “Power” was split into “Power” and “Respect” according to the theoretical model and the category “Profession”, which could not be replicated in factor analysis was reconstructed as “Interest in military tasks”. In order that each of the ten dimensions could be operationalised with six statements, 22 items had to be reformulated. The questionnaire was retested on 428 officer candidates. The number of items was reduced by item and factor analysis to 40, which form nine factors, explaining 66% of the variance. “Power” and “Respect” composed one factor. The reliability of the entire scale amounts to  $\text{Alpha} = .92$ , seven dimensions showing reliability coefficients between  $\text{Alpha} = .81$  and  $.83$ , two of  $\text{Alpha} = .73$  and the dimension “Support for the military services”  $\text{Alpha} = .55$ . The final version of the questionnaire was extended by four general items, which directly pose the question as to whether or not the person intends to pursue a leadership position.

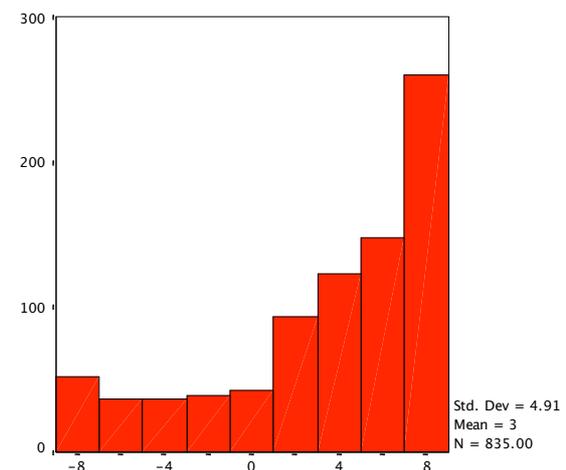
#### 4. Initial experiences

The leadership motivation questionnaire was included in the leader assessment stage II, conducted in April of this year for the first time in the newly reformed army. The analysis of the 835 available data sets confirms the majority of the results obtained in the pilot studies: The motives “Affiliation” and “Leadership” attained the highest scores ( $M = 4.88$  and  $M = 4.44$  respectively on a scale ranging from  $-8$  to  $+8$ ), which corresponds with the results of the recruit survey, in which these dimensions are ranked in 2<sup>nd</sup> and 3<sup>rd</sup> position. “Security” (earning money, tiding oneself over during unemployment) was, with an average score of  $M = 0.17$ , however, considerably less important for the candidates than for the recruits. Surprising is the low score ( $M = -4.59$ ) in the dimension “Support for military services”. Apparently candidates are of the opinion that the decision whether or not to pursue a leadership career, was taken independently of encouragement from their social environment. Table 4 depicts the average scores of the ten dimensions and general direct questions.

Table 4: Average scores of dimensions in the motivation to lead questionnaire (N = 835 candidates; range of scores  $-8$  to  $+8$ )

	M	SD
Affiliation	4.88	3.44
Leadership	4.44	4.33
Independence	3.19	3.71
Performance	2.64	4.19
Patriotism	.75	4.96
Interest in military tasks	.24	4.54
Security	.17	4.28
Respect	-1.16	3.85
Power	-1.96	3.72
Support for military services	-4.59	2.87
General direct questions	2.93	4.91
Entire scale	1.05	2.92

Figure 1: Score distribution of the four general direct questions (N = 835 candidates)



The assumption that school commanders send unwilling candidates to leadership assessment was confirmed: 25% of the scores of the four direct questions are negative or close to zero (see figure 1). Likewise, as expected, information gleaned from the questionnaire proved extremely useful in feedback discussions, as low test scores of unwilling candidates could now be explained.

## 5. Outlook

The questionnaire on leadership motivation proved its usefulness in the selection of future officers. A shortened version with eleven items will therefore be used in leadership assessment stage I for the recruitment of NCOs, so that standardised statements as to leadership motivation are already available at that stage.

Involvement with the subject of leadership motivation and the process of questionnaire construction have raised further questions which should be the subject of future studies. Only a small group of recruits could be questioned as to their reasons for pursuing a leadership position. The aim of one further study is to obtain a more exact picture of relevant leadership motives through a representative survey of recruits. The results could be used to selectively inform recruits about the advantages and disadvantages of a military leadership position and in this way common myths could possibly be quashed. This research should be supplemented with a longitudinal study showing changes in leadership motives over time. The aim is to question participants on orientation days (18 years old), draft days (19 years old) and recruits (20 years old), the latter at the start and finish of military basic training. In this way specific information can be gained and used at subsequent information events.

In addition, differences in reasons for pursuing a leadership position between various military branches and schools are also of interest. During the construction phase of the questionnaire pre-tests exposed considerable motivational differences between various branches of troops. This has probably something to do with the fact that recruits with different functions also have different interests and education. In this respect the influence of career officers on leadership motivation is also of interest. It is well known that positive role models during military basic training affect the recruits' motivation to follow a leadership career. And if, as one career officer mentioned during an interview, the common opinion in schools is that "in the infantry all NCOs have to be forced into the job", then this could be an indication of a self-fulfilling prophecy. In such cases selective further educational events would be advisable for the career officers.

## References

- McClelland, D.C. (1984). *Motives, personality, and society*. New York: Praeger.  
Murray, H.A. (1938). *Exploration in personality*. New York: Oxford University Press.  
Yukl, G.A. (1990). *Skills for managers and leaders*. Englewood Cliffs: Prentice Hall.