CEPOL ANNUAL EUROPEAN POLICE RESEARCH AND SCIENCE CONFERENCE

Lisbon, 5-8 October, 2015

Evidence-based policing: new perspectives of cooperation between practice, education and police science

Ksenija Butorac, Police College, Zagreb, Croatia Ante Orlović, Police College, Zagreb, Croatia Joško Sindik, Institute for Anthropological Research, Zagreb, Croatia

How do police officers perceive certain characteristics of the formal police management?

What Characterizes Effective Police Managers? What activities do they undertake?

(Mitchell Pearson-Goff and Victoria Herrington: Police leadership: A Systematic Review of the Literature, 2013)

Important characteristics

- ethical behaviour
- trustworthiness
- legitimacy
- being a role model
- communication
- decision making and
- critical, creative and strategic thinking ability

Important key activities

- creating a shared vision
- engendering organizational commitment
- caring for subordinates
- driving and managing change
- problem solving

Main goal

 To present perceived characteristics of Croatian police management from the perspective of police officers and in relation to their potentially relevant personal characteristics

Specific goals

- 1. To present congruency of the police officers' (POs) perception of importance and their perception of actual existence of expert, social and strategic knowledge in Croatian police management system
- To present POs' perception of the importance of expert, social and strategic knowledge for police managers (PMs), in relation to 4 POs' characteristics: sex, age group, police department category and length of service
- 3. To present POs' perception of the existance of expert, social and strategic knowledge of actual PMs, in relation to 4 POs' characteristics
- 4. To present POs' perception of the most representative individual characteristics of the actual Croatian PMs.

Methodology

Sample

Convenience sample composed of 132 POs who attended courses at the Police College

Instrument

Three sets of variables were isolated from the **questionnaire**:

- 4 examinees' (PO) personal characteristics questions (nominal and ordinal scale): gender, age group, police department category, length of service and
- -7 police management perception questions relating to perceived relevance and actual exhibiting expert, social and strategic knowledge of PMs (ordinal scale).
- 12 observed PMs' personal characteristics

Methods (SPSS 20 for the Social Sciences)

Descriptive statistics
Nonparametric statistics

Sample description

Males -79,4%

Females – 20,6%

AGE: 25-29 (38,2%); **30-34** (35,9%); **35-39** (20,6%);**40** – (5,4%)

POLICE DEPARTMENT CATEGORY: III - 29,5%; I - 27,0%; IV - 22,1%; II - 21,3%

LENGTH OF SERVICE: 5-9 (53,1%); **15-19** (21,5%); **10-14** (16,9%); **20-** (8,5%)

LENGTH OF SERVICE AT A CERTAIN LEVEL OF HIERARCHY: Police station – 83,1%;

County Police Administration -9.2%; **General Police Directorate** -7.7%

Police Managers: Knowledge, Skills and Abilities needed for successful job performance – 3 categories

- Professional/Technical knowledge/skills domain expertise with special knowledge and skills of a particular area or field; analytical skills of a certain specialty; the ability to use special knowledge of the profession for applying specific methods and techniques in the performance of activities and tasks;
- Social knowledge/skills (dealing with people) the ability of managers to communicate effectively, to motivate and guide the individuals and groups, to build relationships of cooperation and teamwork, create an atmosphere of support and safety and participation of all employees in decision-making;
- Strategic knowledge/skills the ability to see the organization as a whole, high interdependence of the various functions and activities of the organization, the impact of changes in the immediate and wider organizational environment, determining strategic directions for the organization activities and its development.

Statistical analysis

Estimation of importance and level of existance of expert, social and strategic knowledge of PMs

	Importance of possession	f	%	M _e	Level of possession	f	%	M
pu	1-completely irrelevant	1	.8		1-extremly low	3	2.3	
dge 9	2-irrelevant	-	-		2-low	18	13.6	
Expert knowledge and skills	3-neither important or unimportant	2	1.5	5	3-medium	81	61.4	3
ert k	4-important	54	40.9		4-high	28	21.2	
Exp	5-extremly important	75	56.8		5-extremly high	2	1.5	
pu	1-completely irrelevant	1	.8	5	1-extremly low	17	12.9	2
ge a	2-irrelevant	-	-		2-low	59	44.7	
Social knowledge and skills	3-neither important or unimportant	1	.8		3-medium	48	36.4	
cial k	4-important	39	29.5		4-high	8	6.1	
Soc	5-extremly important	91	68.9		5-extremly high	-	-	
ge	1-completely irrelevant	-	-		1-extremly low	13	9.8	
wled Is	2-irrelevant	1	.8		2-low	39	29.5	
Strategic knowledge and skills	3-neither important or unimportant	8	6.1	4	3-medium	69	52.3	3
	4-important	71	53.8		4-high	10	7.6	
St	5-extremly important	52	39.4		5-extremly high	1	.8	

Statistical analyses

Nonparametric statistics was applied because of:

- (1) ordinal scale measurement of the observed variables (perception of importance and perception of existence of relevant police management knowledge),
- (2) the convenience sample,
- (3) mostly non-equal groups defined by independent variables, and
- (4) mostly non-normal distributions:
 - Wilcoxon signed ranks test (testing the difference between perception of importance and perception of existence of police management relevant knowledge)
 - Friedman test (testing congruency of relevant knowledge perceptions)
 - Mann Whitney U test (testing sex differences in the observed variables)
 - Kruskal-Wallis test (testing the dependence of the observed variables to other personal characteristics of the examinees: age group, police department category and duration of police employment)

Differences between *perception of importance* and *perception of existence* of 3 PMs relevant knowledge: expert, social and strategic

On the scale from 1 (completely low) to 5 (extremly high), it is obvious that POs rate of importance of relevant knowledge is very high, while they rate existence of that knowledge quite low:

Descriptive Statistics

	N	Mean	Std. Deviation	Minimum	Maximum
perception of importance of expert knowledge for police oficers (PMs)	132	4.53	.611	1	5
perception of importance of social knowledge for PMs	132	4.66	.577	1	5
perception of importance of strategic knowledge for PMs	132	4.32	.622	2	5
perception of existence of expert knowledge at actual PMs	132	3.06	.707	1	5
perception of existence of social knowledge at actual PMs	132	2.36	.783	1	4
perception of existence of strategic knowledge at actual PMs	132	2.60	.799	1	5

The differences are clearly statistically significant:

Ranks

		N	Mean Rank	Sum of Ranks
(perception of existence	Negative Ranks	116	59.27	6875.00
of expert knowledge at PMs) - (perception of	Positive Ranks	1	28.00	28.00
importance of expert knowledge for PMs)	Ties	15		
	Total	132		
(perception of existence	Negative Ranks	127	64.00	8128.00
of social knowledge at PMs) - (perception of	Positive Ranks	0	.00	.00
importance of social knowledge for PMs)	Ties	5		
	Total	132		
(perception of existence	Negative Ranks	117	60.66	7097.00
of strategic knowledge at PMs) - (perception of importance of strategic knowledge for PMs)	Positive Ranks	2	21.50	43.00
	Ties	13		
,	Total	132		

	(perception of existence of expert knowledge at PMs) - (perception of importance of expert knowledge for PMs)	(perception of existence of social knowledge at PMs) - (perception of importance of social knowledge for PMs)	(perception of existence of strategic knowledge at PMs) - (perception of importance of strategic knowledge for PMs)
Z	-9.509	-9.897	-9.488
Asymp. Sig. (2-tailed)	.000	.000	.000

Differences in *perception of importance* and *perception of existence* among 3 PMs relevant knowledge: expert, social and strategic

There are significant differences in perception of importance: social the most (4.66) and strategic knowledge the least (4.32) important for PMs

Ranks

	Mean Rank
perception of importance of expert knowledge for police managers (PMs)	2.03
perception of importance of social knowledge for PMs	2.21
perception of importance of strategic knowledge of PMs	1.75

Test Statistics

N	132
Chi-square	27.977
df	2
Asymp. Sig.	.000

There are significant differences in perception of existence: expert are the most (3.06) and social knowledge are the least (2.36) present at actual PMs

Ranks

	Mean Rank
perception of existence of expert knowledge at actual police managers (PMs)	2.48
perception of existence of social knowledge at actual PMs	1.61
perception of existence of strategic knowledge of actual PMs	1.92

N	132
Chi-square	77.425
df	2
Asymp. Sig.	.000

Gender differences in perception of *importance* and *existence* of PMs relevant knowledge

No gender differences in perception of importance of PMs relevant knowledge

Ranks

	sex	N	Mean Rank	Sum of Ranks
perception of importance	male	104	65.15	6775.50
of expert knowledge for police managers (PMs)	female	27	69.28	1870.50
	Total	131		
perception of importance of social knowledge for PMs	male	104	64.10	6666.00
	female	27	73.33	1980.00
	Total	131		
perception of importance	male	104	63.75	6629.50
of strategic knowledge for PMs	female	27	74.69	2016.50
	Total	131		

Test Statistics

	perception of importance of expert knowledge for PMs	perception of importance of social knowledge for PMs	perception of importance of strategic knowledge for PMs
Mann-Whitney U	1315.500	1206.000	1169.500
Wilcoxon W	6775.500	6666.000	6629.500
Z	583	-1.408	-1.506
Asymp. Sig. (2-tailed)	.560	.159	.132

No gender differences in perception of existence of PMs relevant knowledge

Ranks

	sex	N	Mean Rank	Sum of Ranks
perception of existence of	male	104	66.56	6922.00
expert knowledge at actual police managers	female	27	63.85	1724.00
(PMs)	Total	131		
perception of existence of social knowledge at actual PMs	male	104	67.81	7052.00
	female	27	59.04	1594.00
	Total	131		
perception of existence of strategic knowledge at actual PMs	male	104	65.93	6856.50
	female	27	66.28	1789.50
	Total	131		

	perception of existence of expert knowledge at actual PMs	perception of existence of social knowledge at actual PMs	perception of existence of strategic knowledge at actual PMs
Mann-Whitney U	1346.000	1216.000	1396.500
Wilcoxon W	1724.000	1594.000	6856.500
Z	379	-1.153	047
Asymp. Sig. (2-tailed)	705	.249	.963

Age differences in perception of *importance* and *existence* of PMs relevant knowledge

No age differences in perception of importance of relevant knowledge

Ranks

	age group	N	Mean Rank
perception of importance	25-29 years	50	63.00
of expert knowledge for police managers (PMs)	30-34 years	47	69.85
	35-39 years	27	58.81
	40 and more years	6	82.33
	Total	130	
perception of importance	25-29 years	50	69.34
of social knowledge for PMs	30-34 years	47	65.07
	35-39 years	27	61.80
	40 and more years	6	53.50
	Total	130	
perception of importance	25-29 years	50	65.91
of strategic knowledge for PMs	30-34 years	47	59.56
	35-39 years	27	73.13
	40 and more years	6	74.25
	Total Test Statisties	130	

	perception of importance of expert knowledge for PMs	perception of importance of social knowledge for PMs	perception of importance of strategic knowledge for PMs
Chi-square	3.911	2.169	3.312
df	3	3	3
Asym ∱3 Sig.	271	.538	.346

No age differences in perception of existence of relevant knowledge

Ranks

	age groups	N	Mean Rank
perception of existence of	25-29 years	50	58.26
expert knowledge at actual police managers	30-34 years	47	75.14
(PMs)	35-39 years	27	65.06
	40 and more years	6	52.33
	Total	130	
perception of existence of	25-29 years	50	61.17
social knowledge at actual PMs	30-34 years	47	69.82
	35-39 years	27	67.80
	40 and more years	6	57.42
	Total	130	
perception of existence of	25-29 years	50	67.29
strategic knowledge at actual PMs	30-34 years	47	72.21
	35-39 years	27	52.11
	40 and more years	6	58.25
	Total	130	

	perception of existence of expert knowledge at actual PMs	perception of existence of social knowledge at actual PMs	perception of existence of strategic knowledge at actual PMs
Chi-square	7.503	1.931	6.354
df	3	3	3
Asymp. Sig.	.057	.587	096

Police department category (PDC) differences in perception of importance and existence of PMs relevant knowledge

The only PDC difference in perception of importance is attributed to social knowledge

Ranks

	PDC	N	Mean Rank
perception of importance	1st category	33	56.30
of expert knowledge for police managers (PMs)	2nd category	26	64.92
	3rd category	36	63.00
	4th category	27	62.56
	Total	122	
perception of importance	1st category	33	53.52
of social knowledge for PMs	2nd category	26	74.88
	3rd category	36	64.50
	4th category	27	54.37
	Total	122	
perception of importance	1st category	33	60.80
of strategic knowledge for PMs	2nd category	26	66.40
	3rd category	36	60.36
	4th category	27	59.15
	Total	122	

Test Statistics

	perception of importance of expert knowledge for PMs	perception of importance of social knowledge for PMs	perception of importance of strategic knowledge for PMs
Chi-square	1.401	10.769	.854
df	3	3	3
Asymp. Sig.	.705	.013	.837

No PDC differences in perception of existence of relevant knowledge

Ranks

	PDC	N	Mean Rank
perception of existence of	1st category	33	55.82
expert knowledge at actual police managers	2nd category	26	64.35
(PMs)	3rd category	36	67.24
	4th category	27	58.06
	Total	122	
perception of existence of	1st category	33	62.85
social knowledge at actual PMs	2nd category	26	49.90
	3rd category	36	69.58
	4th category	27	60.24
	Total	122	
perception of existence of	1st category	33	68.38
strategic knowledge at actual PMs	2nd category	26	47.96
	3rd category	36	66.96
	4th category	27	58.85
	Total	122	

	perception of existence of expert knowledge at actual PMs	perception of existence of social knowledge at actual PMs	perception of existence of strategic knowledge at actual PMs
Chi-square	2.907	5.555	7.398
df	3	3	3
Asymp. Sig.	406	.135	.060

<u>Differences</u> in perception of *importance* and *existence* of PMs relevant knowledge <u>according to length of service</u>

No differences in perception of importance of relevant knowledge

Ranks

	years of employment	N	Mean Rank
perception of importance	5-9 years	69	60.74
of expert knowledge for police managers (PMs)	10-14 years	22	72.95
	15-19 years	28	68.25
	20 and more years	10	67.80
	Total	129	
perception of importance	5-9 years	69	68.78
of social knowledge for PMs	10-14 years	22	64.80
	15-19 years	28	60.05
	20 and more years	10	53.25
	Total	129	
perception of importance	5-9 years	69	63.82
of strategic knowledge for PMs	10-14 years	22	61.34
	15-19 years	28	71.86
	20 and more years	10	62.00
	Total	129	

Test Statistics

	perception of importance of expert knowledge for PMs	perception of importance of social knowledge for PMs	perception of importance of strategic knowledge for PMs
Chi-square	2.882	3.378	1.638
df	3	3	3
Asymp 5 Sig.	410	337	.651

No differences in perception of **existence** of relevant knowledge

Ranks

	years of employment	N	Mean Rank
perception of existence of	5-9 years	69	63.51
expert knowledge at actual police menagers	10-14 years	22	71.27
(PMs)	15-19 years	28	67.07
	20 and more years	10	55.70
	Total	129	
perception of existence of	5-9 years	69	63.87
social knowledge at actual PMs	10-14 years	22	64.98
	15-19 years	28	70.34
	20 and more years	10	57.90
	Total	129	
perception of existence of	5-9 years	69	66.99
strategic knowledge at actual PMs	10-14 years	22	69.48
	15-19 years	28	64.39
	20 and more years	10	43.15
	Total	129	

	perception of existence of expert knowledge at actual PMs	perception of existence of social knowledge at actual PMs	perception of existence of strategic knowledge at actual PMs
Chi-square	1.872	1.153	4.723
df	3	3	3
Asymp. Sig.	.599	.764	.193

Police officers ranking of the frequency of the 12 observed police managers personal characteristics

rank	Personal characteristics
1	Lack of objectivity
2	Superficiality
3	Lack of independence
4	Dishonesty
5	Indecisiveness
6	Unprofessional conduct
7	Decisiveness
8	Professionality
9	Systematic approach
10	Independence
11	Objectivity
12	Honesty

rank 1= the most frequent characteristic rank 12 = the least frequent charateristic

Discussion

Findings

 lack of feedback and communication, and taking responsibility for staff wellbeing and insufficient collaboration, managerial support to subordinates; more personal interactions, coaching and mentoring are needed

Limitation of the research:

 Intentional and relatively small sample of participants was chosen (to represent the entire population of highly educated police officers)

Advantage:

 This research tackles relatively rare topic, especially in Croatian environment - the topic related to the aspects of police management.

Conclusion

Guidelines for future studies and practical suggestions:

- Improvement of normative instruments, such as institutional (job posts, salary, education, police ranks, promotions) and individual stimulations (accountability, work assesment, rewards);
- Improving the selection process of police managers;
- Improving the skills of police managers, through modified process of education;
- The perception of police managers in general could be ameliorated.



Thank you for the attention!