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Psychology of Personality: Real and Virtual Context

METACOGNITION AND SOCIAL METACOGNITION IN DECIDING WHAT IS RELEVANT IN FASHION

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Abstract

While individual metacognitions are responsible for controlling personal knowledge, emotions, actions, social metacognition stand for the process of monitoring knowledge, emotions and behaviour of one another by members of the group and making individual metacognition visible to enhance each member's cognitive experiences. The aim of the research was to show the change in individuals metacognition based on social metacognition. The modification was identified through the change in awareness and level of confidence in the actions of participants in individual and teamwork. The participants were required to keep a journal, to fill it in with significant moments and rate their achievements. As well as, participants were asked to create a fashion look and estimate the satisfaction with it afterwards. Results show that participants with multiple metacognitive beliefs are less confident in their activities, were not happy with created looks. However, metacognitive knowledge of own cognitions helped them to find a solution. In teamwork these participants were able to change confidence by choosing a convenient role in a collective task. Observing visible metacognitions of group members helped to learn and use knowledge to solve personal difficulties, that later was shown in newly acquired awareness about fashion.

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1. Introduction

Being aware and monitoring own knowledge, emotions and actions is known as individual metacognition. Metacognition concerns the processes how we control our own cognitive processes. Metacognitive processes can also affect our automatic behavior, for instance, when short-term benefits counteract long-term purposes or in a situation when narcissistic and altruist values collide (Hacker & Bol, 2004).

As well, metacognition is a mental processes involved in assessment the uncertainty in our choices. The feeling of knowing behind the decision is intuitive, it's a combination of data uniting the state of the environment, a signal, and a random error. There is no bias in two cases: we either average the signal and a random error or get a chance to combine information over repeated observations (Bahrami et al., 2016).

Metacognitive beliefs are a product of attitudes, stereotypes, cultural constructs and a part of decision making (Wells, 2000). We depend on metacognitive beliefs in the measurement of the level of satisfaction of made decisions. The change of metacognitive beliefs is affected by the newly received information when it differs with previously accepted beliefs of the individual (Wolfe, 2018). The social context by its nature creates and accumulates information that appears spontaneously, which leads to a collision of individual beliefs and shifts metacognitive beliefs. Thus, metacognitive beliefs can be experimentally altered through social influence (Dweck, 1990). Thus, social context has tools to impact and influence individual's metacognition.

While individual metacognition is monitoring and controlling one's own knowledge, emotions, and actions, social metacognition is a process of monitoring and controlling knowledge, emotions, behaviours of one another by members of the group and making your individual metacognition visible to enhance each members experiences (Chiu, 2009). Metacognition stands for planning, solving problems and managing personal experiences in a situation of not knowing. Likewise, social metacognition transmit metacognitive requirements among members of the group to increases the visibility of metacognition of one another to develop and enhance individual cognition (Carlson, 2016).

Metacognition are split in implicit, describes as automatic processes of uncertainty monitoring, and explicit, defined as mindful and effortful process specific for human ability for social coordination and cooperation (Frith, 2012). Thus, implicit metacognitions, allow us be a part of the group and identify as "we" and take use knowledge and intentions of others involuntarily, and explicit metacognitions, allow us to reassess and validate ourselves in front of others.

Therefore, ability to share our values and beliefs, to have shared view of the world where useful group communications are ensured is provided by explicit metacognition (Friston, 2015).

Individuals as a part of society, have an ability to interact, along with exposure to external influence. Beliefs, values and goals mainly depend on heritage, family system and group membership, context that is around. Immersion into society causes the interference between individual and social. Recent studies emphasized the role of metacognitive judgments in social interactions, whether social context might mutually impact individuals metacognition (Chiu & Wing Kuo, 2009). Therefore, social context might actually affect metacognition.

Evidently, individuals feel more convinced with made choices and decisions when they are based on strong evidence, rather than ambiguous information. Individual's metacognition in the social situation

might predict who behaves overconfidently assuming the “social weighting sensitivity” (Gajdos et al., 2019). Similarly, the trust is formed based on previous responses and feedback, that can only happen after metacognitive estimation of social sources. Irrelevant, but corollary information compatible to previous decision also increases confidence. As well as, overlapping matching opinions decrease uncertainty. On the other hand, shared responsibility for the decisions help to validate and justify decisions and choices (Chiu, 2009). Having confirmation from others, especially collectively, could decrease the need to find more data to prove the cost of making a decision. Seeking general agreement could also help learn from social signals with a lack of verified feedback about the degree of accuracy of decisions (Bahrami et al., 2016).

To check one’s confidence individuals rely on the process of comparing oneself to another or with other versions of self (in the past or future). Assurance and satisfaction are key indicators of metacognition. Confidence calibration is one of the metacognitive mechanisms that was developed based on social interactions. For example, a decision made with high confidence is more likely to be correct than another decision made with low confidence (Carlson, 2016).

Context is needed to measure one’s confidence to investigate individual and social metacognition, therefore, immersion in the situation. Fashion is a form of standardized mass behaviour that occurs spontaneously under the influence of mainstream-prevailing trends in society (Folomeeva & Klimochkina, 2019). Therefore, based on metacognition, the way individual reacts and behaves to broadcasted trends, values and images vary, as well as, the immersion and objects of significance differ (Slepian, 2015).

2. Problem Statement

The topic of individual and social metacognition is not sufficiently covered in social psychology. Metacognitive components have not been studied through the prism of the fashion industry, which in our opinion, might be a narrow context to a broader field of research.

3. Research Questions

Metacognitions and social metacognitions impact individuals awareness and control over cognitive processes, self-regulation of emotions, actions, knowledge, therefore, metacognitions and social metacognitions interfere with the way individual makes decisions and stays confident with them. Our hypothesis concluded of the idea, that level of confidence in personal decisions corresponds with behavioural strategy in social interaction and correlates with metacognitive beliefs.

4. Purpose of the Study

The research aimed to gather data about interference of metacognition and social metacognition in the process of deciding what is relevant and why in the fashion industry.

5. Research Methods

The sample consisted of 15 participants (female and male of young age ($M=21$, $Sd=0,94$), students of the university.

The study consisted of several consecutive stages. The first stage was dedicated to the development of the research diary: to gather information about participants personality, daily routine and significant values. The diary consisted of 36 pages and included instruction, introduction, various categories “what I value/ love/ care about” and a traditional diary part, where each day of a 10 days period participants were asked to say few words about the day, describe the schedule, highlight best and worst moments of the day, rate the mood through the day, rate the satisfaction with the day on a scale from 1 to 10. Also, each of 10 days had a task “at the end of the day” to reflect on, some days participants were asked to dream about real and ideal selves or how they spent their week and weekends, some days they were asked to create a style, to discuss what is fashionable these days and at some point to talk through their anxiety coping techniques. The main goal of the research diary was give participants an opportunity to share their lives as they are with all the details they want in many different aspects. The instructions asked either to fill in the diary with stories or pictures and drawings.

One of the days consisted of a Short Form of Metacognitions Questionnaire: Properties of MCQ-30 with the approbation on Russian-speaking population (Sirota et al., 2018).

Participants pursued a diary for 10 days and engaged in a focus-group discussion in the end, which was the second part of the study. The aim for the focus-group was to highlight the experiences for the participants, as well as, to make clear all the aspects of each diary, to reflect on given answers.

At the third stage of the study participants were asked to create collective collages in mini groups. The given theme was “Society’s modern trends”. Each group consisted of 3-4 “creators” and one “analyst”, who’s role was to record all the actions and decisions in the process of creation. After collages were done each mini-group were presenting their work with a follow up speech.

The last stage for the participants was to analyse and interpret all the created collages, what were the similarities and differences between all the works, what obstacles mini-groups faced and what information was gathered in the end.

The last stage of the study was the analysis of all the collected data: from diaries to reports about collage’s. The results were processed through a qualitative content analysis, main categories were identified among the responses of the subjects and extracted into central topics. Therefore, we gained data about significant values, fashion trends, daily rituals, metacognitive beliefs and more. The findings consist of deeper results analysis.

6. Findings

Gathered quality data covers a lot and opens a variety of details about participants, in this study we would like to focus on specific information, to look at the data through the prism of 2 main questions: what values and fashion trends are significant for the participants and what is the role of metacognition in the process of deciding what is important.

According to developed research diaries participants highlight the following values:

- viewpoint: thrift shopping, recycling, equal rights, self-care and self-acceptance, simplicity
- self-care includes: health, body-positivity, healthy food, skincare products, working out, home-cooking
- family and romantic relationship, friends, domestic animals
- femininity, grunge style, 60's vibes
- sweaters, sneakers, casual wear, breathy dresses, "dress by the mood", "quality over everything else", nude palette
- online and offline shopping, approved places

The diary format had pro's and con's, the freedom that it gave did not allow us to get specific information from every participant on what fashion picks are they making at the moment. On the other hand, participants showed what they value freely, that gave us understanding that "society's modern trends" include much more than what we see in window displays. Participants took advantage to describe their values, what they care and stand for. For some it was sleek dresses to look like Kim Kardashian, some described grunge looks with masculine boots and breathy dresses, when others spoke about newly introduced books. It's important to mark, that several participants have a selection of beliefs and directions to follow, some are broadcasted in media (feminism, recycling, second life of a garment) and some underlie deeper than media influence, like the traditional value of your parents, loved ones.

Moving on from values and trends to the way participants showcased the information. The majority of participants preferred to write in the most diaries categories, the only exceptions were the introduction page, where participants posted their photo. A couple of participants used this diary as a therapeutic tool and filled in all the pages with details, really shared their emotions and what they are coming through. The majority, on the other hand, preferred to give straightforward answers in few sentences. A lot of the tasks gave a perfect opportunity to use photos, but participants favoured a descriptive portrait. Instead of using a picture of the dress that the participant wants, she describes it with words.

The other significant part of the diary were the pages about anxiety. One asked about reasons to worry and the other about coping skills, as well as, it included a metacognitive beliefs questionnaire. The results shown in Table 01 represent each of the 15 participants has at least one metacognitive belief.

Table 01. Number of metacognitive beliefs among participants

| Metacognitive beliefs | | | | | |
|-------------------------------------|-------------------------|---------------------------------|-----------------------------|---------------------------------|-------------------------------------|
| Number of participants with: | Positive beliefs | Uncontrollability/danger | Cognitive confidence | Need to control thoughts | Cognitive self-consciousness |
| Moderate occurrence | 2 | 5 | 5 | 3 | 9 |
| High occurrence | 4 | 6 | 3 | 2 | 3 |

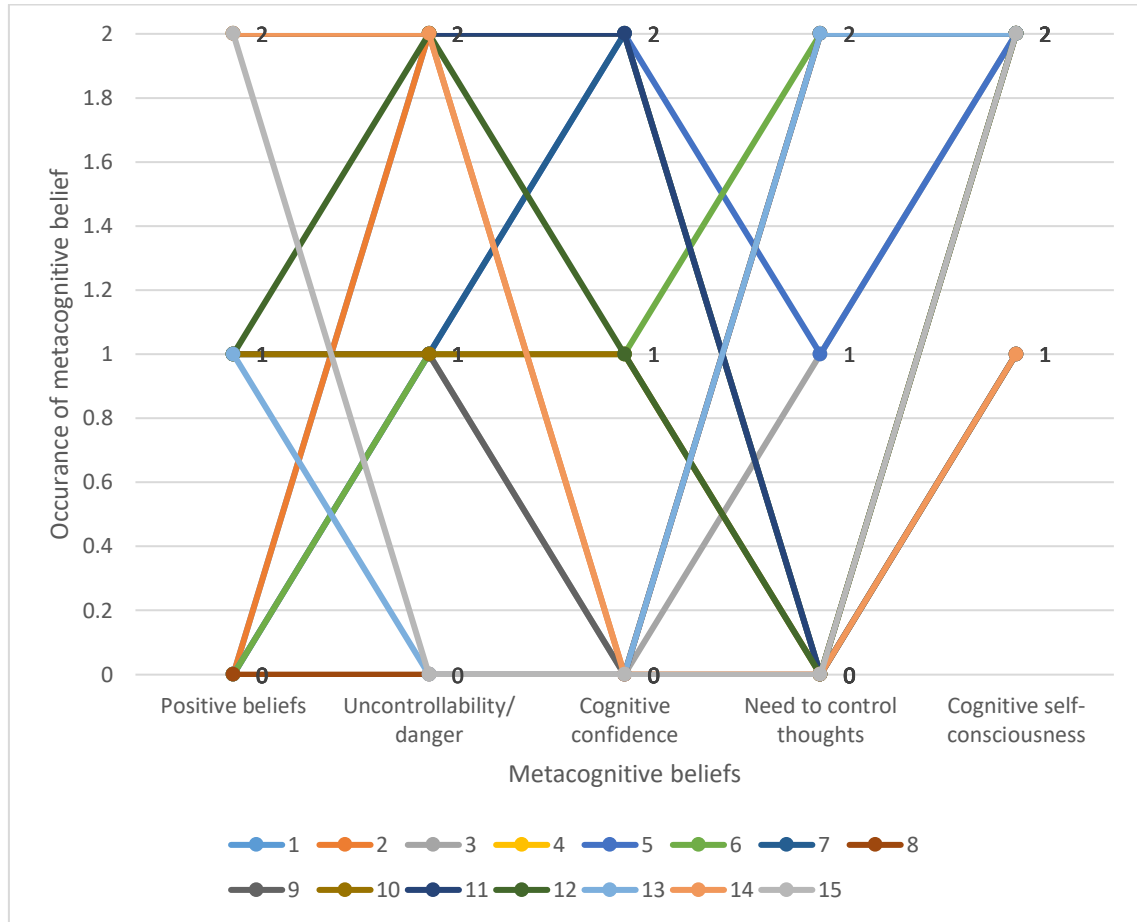


Figure 01. Correspondence of metacognitive beliefs for each participant

Through the period of journaling participants were rating their days, how are they satisfied with day achievements. Table 02 represents the average day satisfaction for each participant:

Table 02. Day satisfaction rate

| Participant | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 | 11 | 12 | 13 | 14 | 15 |
|---------------------|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|
| Average rate (Mean) | 7,5 | 7,7 | 5,9 | 5,6 | 6,7 | 6,6 | 6,5 | 7,5 | 6,9 | 5,7 | 7,1 | 5,4 | 6,5 | 7,7 | 4,3 |
| Sd | 1,1 | 1,1 | 1,9 | 2,9 | 2,3 | 1,8 | 2,1 | 1,1 | 2,1 | 3,1 | 1,4 | 3,4 | 2,3 | 1,2 | 1,8 |
| Variance | 1,2 | 1,2 | 3,7 | 8,6 | 5,2 | 3,4 | 4,6 | 1,1 | 3,2 | 7,7 | 1,2 | 7,8 | 3,6 | 1,2 | 4,1 |

We can bring together the results of metacognitive beliefs and day satisfaction. We notice that participants which are the most unsatisfied with their days have more and higher expression of metacognitive beliefs. For example, Participant number 4 rate the day between 3 and 10, on average 5,6 with 8,64 variance and has metacognitive beliefs: positive beliefs, uncontrollability/danger belief, cognitive confidence, cognitive self-consciousness. Meaning, that this participant is very anxious, worries a lot about a variety of reasons and believes that worry either helps to protect from possible catastrophe or prepares for the obstacles, helps to get in the warrior mode, as well as, the participant is highly reflective of self and believes that has the inability to use cognitive functions in an effective way (inability to remember, distrust of one's memory).

Also, this participant was not happy with the created style in one of the tasks, where participants were asked to create a style and then after a while they were given an opportunity to save or change something in this look and then rate how are they satisfied with it. Participant 4 was happy with the created look at the beginning and after a chance to think participant started to doubt itself and wrote down “I’m not sure if I like the look now, I’d like to change”.

Therefore, this participant is not confident that is shown through metacognitive sensitivity. Let’s keep it in mind while moving to the stage of the study with less individual work.

As we described before, during collage creation we asked participants to create mini-groups and to choose “analyst” in every group to report the actions. Coincidentally Participant 4 chose to be analyst, to follow a discussion of the mini-group, where others were leading and deciding what are modern trends.

After these work analysts were asked to write reports based on the group work, to highlight similarities and differences between all the mini-groups, to give a summary on society’s modern trends. Participant 4 did a great job in that report, recalling all the tiny details of the conversation, quoting opening-leaders of the group, giving practical and theoretical data to prove every trend.

What we are seeing in this situation is social metacognition working. In the individual work Participant 4 did not feel enough experience, nor confidence to finish the task successfully and had a very strict negative judgement on own work (metacognitive accuracy). Later, during collage creation, Participant 4 used own metacognitive knowledge (I’m not good at styling) and decided to choose the role of the analyst in teamwork, by picking this role participant 4 showed ability of self-regulation (instead of failing as a creator, chooses to observe and learn). Knowledge, that in this circumstances “I’ll be better as a reporter”, gave Participant 4 an ability to gain needed knowledge and later successfully prepare a summary. But, not only observation helped. The “creators” of the mini-group where participant 4 was “analyst” helped, by monitoring each other as a team, by using specific strengths of each individual in this mini-group, participants created an informative collage. Together as a team, they distributed the roles and divided responsibilities, identified who has better knowledge of fashion, who is better at finding relevant pictures and etc. Recognized correct ideas and rejected flawed, they were discussing, build shared knowledge and each expands individuals understandings on the subject. Nonetheless, they were having fun working together, gave each other emotional support and reduced distractions and mistakes. In the end, by working together each of the group members showed their strength and made own metacognition visible, others observed it and it improved their knowledge of own cognition, that later results in broader experiences to manage difficulties individually.

Going back to the Table 2 and Figure 1 we notice, that Participant 4 was not the only person to have multiple metacognitive beliefs and was not satisfied with daily achievements, as well as, being critical towards oneself in the making of daily tasks in the diary. Not coincidence participants 10 and 12 also chose to be “analysts” in the collage creation. Based on personal metacognitive knowledge they preferred to manage the situation through their strength – collecting the data and monitoring group members. After, both prepared detailed reports about the work.

Other participants who took part in the making of the collage but had more than one metacognitive belief and showed inconfidence in daily ratings and tasks, were less active in the discussion. One of the participants with metacognitive beliefs: need to control thoughts and cognitive self-consciousness waited,

while most active mini-group members finished the majority of the work, and then proposed her ideas, suggestions had meaningful arguments and eventually all the ideas were a part of the collage.

On the other hand, several participants who took active parts in the process of making collages were too confident with actions and eventually, their decisions were gone. Both of these participants share a metacognitive belief of cognitive confidence, thus, they lack awareness and believe to have the inability to manage own cognitive system.

In the final part of the study, we were able to expand the list of values and fashion trends. In addition to the previous list:

- “self-worth”: luxury brands as a sign of worth, plastic surgeons and cosmetic procedures, physical appearance
- easy-living: using gadgets to reduce “human impact”
- working 24/7, workaholism, financial stability, being popular on media
- living in the city or moving out, cosy environment

7. Conclusion

While working alone individuals benefit from individual metacognition: set and gain goals, organize recourses and evaluate information, highlight what is relevant at a given situation. One’s beliefs affect view of one’s experiences by one’s own belief system. If according to beliefs system a person considers itself as not good enough, incompetent, unknowledgable, lacking the inability to manage itself, then this individual won’t succeed in the task. Based on personal experiences there are ways to use personal metacognitive knowledge and find solutions on how to solve problems and manage the situation, while for some individuals being metacognitive would be observation and working collectively. In this case, teamwork provides individual with extra recourses in a form of others, therefore, by spreading tasks between group members increases the visibility of others metacognition, thus, positively affects individual cognition.

Current research proves that participants who lack knowledge, confidence and are metacognitively sensitive resolve their difficulties in a social situation. Social metacognition distributes metacognitive responsibilities across group members, increases the visibility of metacognition to facilitate learning and improve individual cognitive processes. Therefore, the research collected data not only about individual and social metacognition, moreover, broaden the data on significant values and fashion trends.

The aim for further work is to magnify the sample and check detected correlations on a broader part of a population. As well as, to add more specific details about current fashion trends and how they interfere with metacognition.

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