Theory of (Un)Planned Behavior?
How our behavioral predictions suffer from "unplanned" actions

Oleg Chernozub
PhD; Lead Researcher
Federal Center of Theoretical and Applied Sociology of the Russian Academy of Science
17218, Krzhizhanovskogo Str., 24/35, Korpus 5, 117218, Moscow, Russia,
E-mail: 9166908616@mail.ru

An influential model in micro-sociology, the Theory of Planned Behavior (TPB) provides one of the most popular instruments for the prediction of social actions. Its focal point is the assumption that intentions are *obligatory* mediators between initial behavioral factors and corresponding actions. If some people break their intentions, TPB interprets this as those intentions have been "inflated" under the pressure of external factors. TPB does not claim to explain these factors, but rather argues that there is a gap between "perceived" and "actual" control over behaviors. In this way, the concept of "unplanned behavior" caused by some uncontrollable *external* factors emerges.

This contribution proposes an alternative approach. Here, we examine an assumption of the existence of *internal* factors of behavior which are still not accounted for by the current TPB model, but can explain "unplanned" behaviors. As an example of these still uncounted-for factors, we chose an implicit component of general attitudes which is in line with the sociological interpretation of the Dual-System Theory. By demonstrating how this factor contributes to behavior bypassing intentions, we can expand the TPB model to include at least some variants of behavior, which, for now, are counted as "deviant" from predicted behavior.

Theoretically, this may lead to a restructuring of the TPB basic model through its enrichment by this factor. In practice, at least some fractions of "unplanned" actions will become accessible for prediction.

Keywords: factors of behavior; two-component model of behavioral factors; explicit factors; implicit factors; attitude; structural theory of attitude; dual process; dual system theory; reasoned action approach; theory of planned behavior; DST; GATA; RAA; TPB; MODE; RIM

1. The aim and scope of this contribution

The imperfections of available behavioral models are painfully obvious to practitioners. To illustrate the current state of affairs, one can mention the dramatic failures of electoral forecasts during the last decade[1]. Some resonant cases even prompted industry investigations (Kennedy et al., 2016; Sturgis et al., 2016). The analysis of these investigations reveals two general domains of possible errors, those of sampling, and the inflated

---

1. The incomplete list of such failures that occurred at the level of the whole industry includes the 2014 parliamentary elections in Moldova, the 2015 parliamentary elections in the UK (led to an industry investigation), the 2015 Knesset elections in Israel, the 2015 Referendum in Greece, the 2015 presidential elections in Poland, the 2015 presidential elections in Belarus, the 2016 Brexit Referendum in the UK, the 2016 presidential elections in the USA (which led to an industry investigation), and includes the 2017 parliamentary elections in the UK.

intentions of respondents. The latter results in so-called "unplanned" behavior, which is practically inaccessible to any kind of measurement and prediction.

In this article, we will examine an alternative approach. We will try to assess the scale and mechanism of the emergence of at least a fraction of unplanned behavior. To do this, we should test the Dual System Theory's (DST) potential to explain the respondent intentions' inconsistency that counts as an apparent cause of "unplanned" and "unpredictable" behavior. According to the classification of dual-process research in sociology by Vanina Leschziner (2019), this paper is a sample of a study focusing on the implicit factors that influence the social actions' escalation process. We do not investigate cognitive processing itself, but rather both of its components as potential precursors of actions.

We assess this effect by comparing the predictive power of the model with and without an implicit or unconscious component. As a control model for predicting behavior, we probably the most the most popular and, in any case, generally accepted forecasting model of the Theory of Planned Behavior. The experimental model is represented by the TBP model enriched with an implicit component of the general attitude towards an object of action.

The sociological value of this attempt is hidden in the analysis of the interaction between two DST components, a lack that has drawn attention from some scholars (Vila-Henninger, Luis Antonio, 2015).

Our design addresses a variety of related but conceptually distinct disciplines of macrosociology, microsociology (social psychology), and cognitive- and neuro-sciences. This generates some disturbance concerning conceptualizations and terminology. Through the entire article, we interpret terms borrowed from all of these disciplines such as "acts", "actions", and "behavior" as equivalents, representing localized, specific, and spatiotemporal volitional activities of an individual or a group. In the context of the "reasoned action approach", these activities are also viewed as "*social* actions". In certain cases, we refer to pure sociological interpretations of "action" versus "behavior" concepts, marking them with special notes.

We expect to see recommendations for improving behavior forecast's accuracy as a practical impact of this study. Anticipating theoretical contribution refers to the empirically-proven defining of mechanisms with which implicit factors *may* disturb initial intentions results in "unintentional" or "unplanned" actions for an external spectator.

In real life, the potential impact of implicit determinants on behaviors may depend on many factors, including environmental ones. We do not try to assess the role of these potential factors here, but rather detect, describe, and interpret the phenomenon of implicit mechanisms that generate "unplanned" behaviors. That eases the constraints of ecological validity for our experiment, fitting the methodological requirements of everyday realism well enough.

Finally, we do not claim to offer the holistic theory of unplanned / unintentional behavior. Instead, we seek to reliably explain at least some of its fractions in order to improve our social action prediction models.

2. Intention-based models suffer from unintentional actions

Starting with Max Weber, intention-based models of explanation and behavior prediction are rooted in the concept now referred to as the reasoned action approach (RAA). To this day, RAA is one of the most fruitful grounds for the development of theories of social behavior. There are three influential models that fit within the RAA framework and effectively support it with their findings. These are the theory of planned behavior (TPB) (Fishbein, Ajzen, 2011), Bandura's 1986 social cognitive theory, and the health belief model (Janz, Becker, 1984).

Generally speaking, RAA assumes that human behavior involves some degree of reasoning. A "reasoned" action means "correct" or "right" not in objective reality, but in the minds of the actors. Being directed by "reasonable" factors is enough for actors if they *believe* these factors will guide them to the viable possible option. Reasoned actions are intentional and aim at the subjective goals of actors.

Within this framework, intentions take a very special place. They are the aggregation points of *all* processes preceding actual behaviors. The primary purpose of these processes is to estimate possible outcomes of a planned action and to assess their impact on the actor's goals. However, these evaluations and their background factors do not affect behavior directly. Intentions are an unavoidable mediator between numerous behavioral precursors and real actions. As intentions are formed, they start to drive a stream of corresponding actions, and there is nothing else that could substitute them for this function (Fishbein, 1967). In contrast to this, unplanned behavior is behavior for which people do not have intentions (Gibbons et al., 1998). The Protection Motivation Theory (Rogers, 1975) and the Theory of Planned Behavior (Ajzen, 1991) also regard unplanned actions as unintentional.

In many cases, this model proves its validity. A thorough meta-analysis of behavior-changing interventions has revealed strong support for assuming the causal effects of intentions on actual behavior (Steinmetz et al., 2016). There is, however, a flip-side of the coin.

Everyday practices, and especially the experience of electoral predictions, show many actors ruining their initial intentions and behaving in a "unintentional" or "unplanned" way. That points to a phenomenon of discontinuity between intentions or plans and behaviors. The phenomenon can take the form of inaction where the corresponding intention is to act, or of action, where the corresponding intention is not to act. To illustrate the state of affairs, we refer to the unique effort of a systematic investigation of the problem.

T. Rogers and M. Aida (2012) collected data on voting intentions declared by thousands of respondents during several independent pre-electoral surveys preceding several independent elections in the US. Then, they matched these data with electoral databases in the states where records of visiting polling stations are open to the public. The resulting sample turned off a bulk of the 29,403 respondents for whom there was reliable data of both kinds, that is, for intentions and for actions. In spite the fact that this sample does not represent the entire electorate, it seems reliable enough to draw accurate conclusions about intention-action inconsistency. Table 1.1 illustrates them with an example.

Table 1.1. Planned and unplanned behavior

Intention	Actually did vote	Actually didn't vote	Total
Yes	30,4%	36,0%	66,4%
No	7,0%	16,8%	23,7%
Not sure	4,2%	5,7%	9,9%
Total	41,5%	58,5%	100,0%

Source: (Rogers, Aida, 2012: 18), calculated as shares of the total sample.
Recalculated by Oleg Chernozub on the basis of the source data.

As we can see in Table 1.1, there is a considerable share of respondents who clearly failed to realize their intentions. There are 36% of the total sample who, in contrast to their declared intentions, did not vote. and 7% who did. The total of 43% of the sample displayed the "unplanned" behavior. This scale is quite similar to the "planned" one: only 47,2% (30,4% + 16,8%) of respondents confirmed the seriousness of their intentions through action. Considering these statistics, it is clear that this is a problem that can not be ignored.

The RAA recognizes a gap between intentions and corresponding actions caused by the inevitable time distance between the decision to act and the action itself. According to the theory, this phenomenon can be explained by the concept of intentions' "inflation". Every time an action escalation process is undertaken, some intervening factors are likely to change the initial intentions. The larger the time gap, the more in quantity and the stronger potential external factors are, the greater the chances of losing the connection between initial intention and actual behavior. In particular, the TPB directly points to one of these intervening factors, namely "actual behavioral control". The TBP regards it as the main potential cause of intentions' inflation.

In other words, the TPB suggests that some scale of an intention — behavior inconsistency is normal and can be explained by the pressure of intervening forces that "inflate" initial intentions. Let us consider the effect of these forces by comparing their impact on those, who have intention and those who have not. Table 1.2 presents the accuracy of turnout predictions for each intention group.

Table 1.2 Turnout prediction inaccuracies by intention groups.

Intention	Actually did vote	Actually didn't vote	Total
Yes	45,8%	54,2%	100,0%
No	29,3%	70,7%	100,0%
Not sure	42,4%	57,6%	100,0%
Total	41,5%	58,5%	100,0%

Source: (Rogers, Aida, 2010: 18).

Taking actual behavior into account, the opt-in and undecided groups split almost identically, 45,8% to 54,2%, and 42,4 to 57,6%, respectively. This means that knowledge of intentions sometimes adds disappointingly little to our ability to explain and predict behavior. That is the essence of the problem. This is not a surprise since the intention — based prediction for this particular case was 66,4%, while the actual turnout was — 41,5%.

All other studies analyzed by Rogers and Aida provide exactly the same results; in fact, we can find almost identical observations based on any study that explains intentions and behavior (Chernozub, 2020a, 2020b). For the bulk of unplanned behavior, we have almost no chance to verify the severity of impact or even the existence of any "intervening forces". Usually, when a period between intention formation and behavior is controlled by the researcher, we do not see even a hint of interference.

For example, we conducted online research for many years where respondents had the option of getting a discount on their favorite consumer goods items. There was an alternative option to finish the online session right there and then. This proposition of a few seconds results in confirmation of their intention to buy an item in the next three months. The coupon is valid for three months, and could be used for both online and in-store shopping. It is added to other discounts, if any. Technically there is no effort required to get it. Thus, what percentage of consumers changed their intentions? Table 1.3 represents the results, based on the five last waves of the study (2021 — 2022, quote-controlled river sampling, 600 respondents per wave, and 3,000 observations of the total sample).

Table 1.3. Unplanned behaviors in the process supposedly unaffected by intervening forces

	Wave 1	Wave 2	Wave 3	Wave 4	Wave 5	Mean
Intented to act						
Action	35,3%	35,9%	37,7%	33,6%	29,6%	34,4%
Inaction	64,7%	64,2%	62,3%	66,5%	70,4%	65,6%
Unintended to act						
Action	31,1%	31,4%	35,0%	29,5%	26,3%	30,7%
Inaction	68,9%	68,7%	65,0%	70,5%	73,7%	69,3%

Table 1.3 demonstrates almost exactly the same results as the findings of T. Rogers and M. Aida. On average, 65,6% of those in the "intended" group and 30,7% of those in the "unintended" group fail to deliver on their intentions. Corresponding figures from table 1.2 are very close, since "unplanned" turnovers account for 54,2% and 29,3% of total behaviors, respectively. One could assume a wide range of intervening factors causing the "intentions' inflation" during the electoral process, but that seems like a difficult task for our experiment.

Data indicates that some factors inherent in the action escalation process determine at least some fraction of "unplanned" behavior. Most often, they are in place at the mo-

ment of intentions' formation, but somehow lurk in a shadow right until the moment when it is time to act. If this assumption is valid, there is a chance to detect and take them into account while predicting behaviors. Certainly, that potential improvement will not eliminate the notion of intervening factors, but should help to expand the scale of explanation for predictable behavior.

The existence of "unplanned" behavior is a painful issue for practitioners. In the spheres where the accuracy of predictions is permanently and effectively validated, like electoral studies, various models of "likely actors" are developed (Perry, 1960, 1962, 1973, 1979; Newport, 2008).[2] Taking the RAA as the base model, they add varied combinations of additional filters to correct intention-based models' "raw" output. They use historically tested indicators of action probability to classify respondents as "likely" or "unlikely" actors. In electoral studies, a giant compendium of these indicators has been collected by the ANES project.[3] Sometimes, these additional corrections to the basic models turn out to be effective, at other times, not. Sadly, the results are unstable and sometimes so disappointing that industry investigations have been organized to figure out what happened (Sturgis et al., 2016; Kennedy et al. 2016). Unsurprisingly, this stimulated attempts to elaborate substitutes like prediction markets (Arrow et al., 2008; Atanasov et al., 2015), surveys of expectations (Rothschild, Wolfers, 2011; Graefe, 2014), social media content analysis (Tumasjan et al., 2010), and economy-based forecasts (Tufte, 1978), all quite alarming signals for pollsters and sociologists.

The natural cause of that instability is the 'likely actor' concept itself. Methodologically, these models study not the *driving forces* of behavior, but more or less reliable *indicators* proving the validity of declarative intentions. Therefore, they focused not on the evaluation of behavior's inner drivers' strength and valence, but on the similarity; does this particular respondent looks "like" a typical historical actor, or not? Generally speaking, they use associative ties instead of cause-and-effect relations. For true understanding and reliable prediction of behavior, it is obviously not enough.

Unsurprisingly, there are some theories pointing to the fact that RAA models do not predict unplanned behaviors very well. Some of them explain unplanned behavior as guided by automatism, which does not take part in the development of intentions (Gibbons et al., 1998). In others, affect overrides RAA reflective mechanisms. (Friese, Hofmann, 2009; Hofmann et al., 2009). There is quite a popular theory that unplanned actions can be attributed to habits (Soror et al., 2015), stereotypes (Devine, 1989), and ritual (Collins, 1981). The heuristic behavior theory occupies a somewhat special place, assuming some behavior could be intentionally random (Chaiken, 1980).

There are some studies that focus specifically on the phenomenon of unplanned behavior. From the latest studies, we may outline a study of unplanned use of social net-

---

2. Please see: Likely voters IV — The Gallup model. Mystery Pollster URL: http://www.mysterypollster.com/main/2004/10/likely_voters_i_1.html for the current state of the model.
3. American National Electoral Survey. Please see: https://electionstudies.org/ for details.

working sites (Turel, Qahri-Saremi, 2018), and several studies of unpredictable buyer behaviors (Bell, et al., 2011; Hui, et. al., 2013; Chomvilailuka, Butcher, 2014).

These examples represent two opposing approaches to the explanation of the phenomenon of unplanned behavior. According to Turel and Qahri-Saremi, unplanned behaviors are a function of an actor's cognitive system. Bell, Hui, and their coauthors explain unplanned behavior as being caused by stimuli that fill the gap between the formed intention and the actual behavior. This is a principal divergence. In the first approach, unplanned behavior is a characteristic of the actor. In contrast, in the second approach, it is a characteristic of the environment in which the action is performed.

Sociologically, these interpretations can be viewed as problems of the respondents' inconsistency (deliberate misreporting or lack of introspection issues) or intentions' "late swing". Both interpretations present a way to improve our explanatory models. If a tendency to unplanned behavior is a trait of the actor, then it should exist before forming of intention and may be accounted for by a model. If unplanned behaviors are a result of impact of intervening factors, the model should include some explanations why some intentions survive but others do not.

We contend that the explanation of the phenomenon of unplanned behaviors could be improved by expanding the RAA model into a domain of implicit behavioral factors. This expansion could redefine the set of these factors, if it helps to understand why some behaviors obey the intention-based model's prescripts.

3.   Theoretical design and framework

3.1 A comparative approach

Our general assumption is that *not every "unplanned" behavior is truly unplanned*. It may look unplanned due to the fact that RAA models are not accurate enough at defining and identifying intentions. Some of the true intentions are presumably guided by implicit factors and therefore are ignored or invisible for the RAA models.

Thus, in this paper we discuss the results of an experiment where the RAA model was enriched with an implicit predictor, which proved its effectiveness in numerous electoral studies. As a perfect example of a RAA-based model, we take the Theory of Planned Behavior (TPB). As a mechanism of integrating explicit and implicit determinants, we take our two-component model (TCM) of behavioral factors (Chernozub, 2018a, 2018b, 2020a, 2020b).

In this way, we create two models. The "control" model contains no implicit component and represents the "pure" TPB model. The "experimental" model is actually the same TPB model except for an implicit component of "general attitude", whose explicit component is an "official" part of the original TPB model.

In comparing behavior driving forces and locations where these forces are generated for both models, we plan to identify the implicit component impact and mechanisms for its transmission.

3.2 The theoretical framework for the control model

The Theory of Planned Behavior (Fishbein, Ajzen, 2011) is one of the most influential theoretical models in the social sciences. Within the TPB framework, it is assumed that human behavior involves some grade of reasoning and actions are intentional and aim at the subjective goals of actors. "Reasoned" means "correct" or "right" not in objective reality, but in the mind of the actors. Being directed by "reasoned" factors is enough for an actor if he *believes* these factors guide him to the most viable option.

The TPB model's specific value for our experiment is rooted in its representation of human behavior as a well-structured process which starts with encountering the initial stimuli and ends with the accomplishment of actions. The TPB argues that any action is preceded by an intention, when looking at the action-escalation process backwards. The intention in turn is an outcome of interaction between three factors presented as actors' "estimations". These estimations take the form of reasoned calculations but are driven by subjective "beliefs". As mentioned above, the latter may be far away from reality. Last but not least, the beliefs are influenced by "background factors" such as societal pressure, personal characteristics, cognitive abilities, cultural environment, etc.

The three basic factors of (subjective) beliefs and corresponding (rationalized) estimations are:
- Behavioral beliefs /attitudes asks whether a particular action appears beneficial enough for the actor. That is a core concept of the RAA which is based on the expectancy-value model, where the evaluation of possible outcomes of planning behavior against personal goals is weighed by the probability of these outcomes.
- Normative beliefs / subjective norms. Actors take not only their own instrumental benefits of planned actions into account, but also the anticipated effects of these actions on their social environment. That is an incredibly critical component that dramatically distinguishes the RAA from economic models focused on hunting for a better balance of gains versus losses. As a result, this factor may support, alter, or block an actor's action according to expected reaction of the actor's social environment.
- Control beliefs / perceived behavioral control. This factor reflects the actors' assessment of their control over the situation of action, in particular, whether the planned action is feasible for them or not.

Historically, behavioral attitudes were introduced as the first factor of the model (Fishbein, 1967) reproducing the 1948 Friedman-Savage pattern of "economic behavior". At the very beginning, behavioral attitudes were viewed as the only factor of reasoned behavior and social action. The theory assumes that the conscious summation of all possible effects of planning behavior necessarily takes into consideration all other determinants, e.g., anticipated reactions of a social environment. Later, M. Fishbein and I. Ajzen (1975) split this integral factor into two, adding normative beliefs / subjective norms as a representation of "social pressure" effects. These two factors constitute the Theory of Reasoned Action (TRA). The TPB differs from it by the third factor, which explains why

some actions may be omitted even if they are beneficial for actors and are socially acceptable. Control beliefs were introduced as a third factor. Now, the TRA is viewed as a particular case of the TPB where actors believe there are no external barriers to accomplishing the action (Fishbein, Ajzen, 2011).[4]

For further discussion, following A. Ajzen, we will use the term "beliefs" to name these three TBP factors, keeping their dual nature in mind, as subjective beliefs that have been transformed into rationalized estimations.

Finally, the TBP does not overestimate explicit (conscious or reflective) and disregard implicit (unconscious or impulsive) factors of behavior, but presumes they both are counted by the model within its "beliefs" predictors. Aizen would write that "In the TPB, the fundamental determinants of intentions and behavior are the behavioral, normative, and control beliefs people hold in relation to the behavior in question. However, no assumption is made about the objectivity or veridicality of these beliefs. They may be based on invalid or selective information; *they may be irrational, reflecting unconscious biases, paranoid tendencies, wishful thinking, or other self-serving motives*; and they may fail to correspond to reality in many other ways" (2019 — *italics added*).

3.3 The theoretical framework for the experimental model

It has been pointed out that for a long period of time, the RAA models in taking into account only sensible, rational factors of behavior are not able to convincingly explain the entire diversity of human behavior (Baumeister, 2002; Goldstein, Gigerenzer, 2002; Kahneman, Frederick, 2002; Shah, Oppenheimer, 2008; Hofmann et al., 2009; Kahneman, 2011; Wood, Bechara, 2014; and Thaler, 2015). Against this background, a whole spectrum of various theories has emerged, combining both "reflective" and "impulsive" factors as determinants of behavior. (Fazio, 1990, 2007; Kahneman, Frederick, 2002; Gilovich, Griffin, 2002; Strack, Deutsch, 2004).

Due to the fact that the former are quite conscious phenomena relatively easily accessible for introspection from the point of view of social measurements, they are usually associated with "explicit" (overt) factors of behavior. The second group is relatively less accessible for direct fixation and may remain unrecognized not only by the researcher, but also by the respondent himself. This group of influences is associated with "implicit" (hidden or ulterior) behavioral factors.

The presence of implicit determinants of behavior is quite reliably established (Rosenberg, 1956; Rosenberg, et al., 1960). In the same way, their influence on behavior is proven, if not directly, then at least through the mechanism of consistency/inconsistency of the components of attitude (Metcalfe, Mischel, 1999; Strack, Neumann, 2000; Greenwald et al, 2009a, 2009b; Perugini, 2005; Perugini et al., 2010; Roccato, Zogmaister, 2010; Chernozub, 2018b, 2020a, 2020b). This approach, usually known as the Dual System The-

---

4. Please see: https://people.umass.edu/aizen/tpb.background.html for a summary of the last findings.

ory (DST), serves as a ground for dual-process theories of information processing and decision-making.

An action escalation process starts with activation of an "implicit" system. This system stores mental associations between stimuli, behaviors, and rewards, retrieving them when a stimulus is presented. Creating expectations for dopamine release, the reactive system motivates immediate action (Meshi et al., 2015). The very process of forming chains of associative links is hidden from a person whose consciousness only sees its final result (Sloman, 1996; Smith, DeCoster, 2000). This "reactive" or "impulsive" system produces an automatic response pushing an actor towards (presumably) rewarding behavior. These associations, stimulus — prescribed behavior — reward, are activated quickly and independently of conscious control.

The other, the "reflective" system, mobilizes the resources of self-awareness and tries to control, block, or alter the guiding pressure of the first one (Turel, Bechara, 2016).

In its most general form, it is believed that one of them is governed by the rules of conceptual thinking and that a person is fully aware of both, that is, the process itself and the rules in accordance with which he performs logical operations. In this way, the second system is "explicit" in the introspection of actors, and has relatively low barriers for effective external observation.

A response to stimuli always begins with the activation of the impulse system. Normally, a conscious mechanism is prepared to intervene in an action escalation process and to keep an actor from potentially harmful consequences of an impulsive system impetus, if any. Sometimes however, the impulsive component is strong while the reflective aspect is relatively weak. This is the balance that results in "unplanned" behavior (Turel, Qahri-Saremi, 2016). However, there are strong barriers to the activation of this reflective system, as its functioning is extremely resource-consuming. For example, according to the Motivation and Opportunity DEterminants model (MODE), the impulsive system is automatically activated after exposure to a stimulus. As individuals tend to evade spending additional resources, impulsive factors directly determine the bulk of actual behavior. It is only in some cases, if an actor recognizes the significance of the anticipated action and simultaneously has opportunities for thinking (has a clear mind, has knowledge and time to think, etc.), that the rational apparatus of a person is involved in the refining of the initially prescribed option (Ranganath et al., 2008; Koole et al., 2001; Gawronski, LeBel, 2008; Jordan et al., 2007; Kendrick, Olson, 2012).

Theoretically, the most significant consequence of these assumptions is the denial of the joint impact of explicit and implicit components on behavior. Behaviors are influenced either by the implicit or (if they have been activated) by the explicit determinants. According to the MODE approach, empirical confirmation of this assumption is provided by a strong correlation between the implicit and explicit components identified in the course of numerous studies (Fazio et al., 1995; Dasgupta, Rivera, 2006; Conner et al., 2007; Florack et al., 2001; Koole et al., 2001; Ranganath et al., 2008). An alternative approach might be described by the Reflective — Impulsive Model (RIM). This model is based on the assumption of a high degree of independence for each of the components.

Both systems have their own nature, obey their own laws, and compete for the "right" to have a decisive influence on the course of actions that will be chosen. According to this approach, the inconsistency between implicit and explicit factors of behavior is the norm of an action escalation process (Strack, Deutsch, 2004; Strack, Neumann, 2000).

While the natures of the two DST systems are relatively clear, their naming terms are still far from being standardized. The formulations for the components of numerous DST models vary from theory to theory and seem inconsistent (Evans, 2009). There are, for example: "heuristic" vs. "systematic" processing (Chaiken, 1980), "automatic stereotyping" vs. "suppression" (Devine, 1989), "automatic affective reactions" vs. "self-control" (Friese, Hofmann, 2009; Hofmann et al., 2009), "habit" vs. "self-regulation" (Soror et al., 2015), "impulsive" vs "reflective" processing (Strack, Deutsch, 2004), controlled or deliberative vs. automatic or spontaneous (Fascio, 1995, Fazio, Olson, 2014), etc.

We avoid discussing the specifics of understanding and naming DST components in this study. We use conventional names for the "implicit" and "explicit" components of an action escalation model to represent the effects imposed on it by impulsive and reflective systems respectively.

Sociology presents this approach as "dispositional vs. deliberative" types of action (Bourdieu, 1980/1990; Joas, 1996; Swidler, 2003). In the past few years, sociological interpretations of dual-process theories were developed in cultural and cognitive models. In general, sociologists do not study the cognitive process itself, but examine the idea of autonomy and the interaction of consciously-controllable and uncontrollable factors of social interactions[5] (Auyero, Swistun, 2008; Vaisey, 2009; Martin, 2010; Lizardo, Strand, 2010; Srivastava, Banaji, 2011; Pugh, 2013; Patterson, 2014; Leschziner, 2015; Leschziner, Green, 2013; Vila-Henninger, 2015; Lizardo et al., 2016; Rivers et al., 2017).

3.4 The experimental model's conceptual design

The integration of the DST concept into the conventional TBP model can be achieved by applying our two-component model of behavior factors (TCM). This is a sociological model rooted in the structured theory of attitudes. The TCM regards the implicit and explicit components of attitudes as independent factors of behavior. Whether or not formal intentions are formed, their behavioral impact results from the conflict between influences generated by every component.

The TCM generalized all possible combinations of attitudes' explicit and implicit components by into four "consistency statuses". Two statuses of consistent attitudes, where both components demonstrate the same valence, are "consistent positive" and "consistent negative" attitudes. Two inconsistent statuses are "explicit positive, implicit negative" and "explicit negative, implicit positive" combinations of the components.

It is assumed that the consistent positive status should generate a higher probability of action, while consistent negative status should generate a higher probability of inaction.

---

5. In the sociological interpretation of these terms.

Inconsistent statuses should be placed in the middle of the row. In the fields of behaviors which tend to the superiority of reflective drivers, it is anticipated that "explicit positive, implicit negative" status will motivate more actions than the "explicit negative, implicit positive" status, while in the fields where impulse drivers are relatively strong, it will be the other way around.

These assumptions are well proven. Table 3.1 represents an example of the aforementioned regularity. Empirical data was obtained through an Internet survey. The quota-controlled sample represents the population of the Russian Federation aged 18 to 45 years. The respondents completed a "psychological test" in which an implicit measurement concerning the attractiveness of obtaining test results was included. Then, respondents were explicitly asked about their attitudes towards a chance to look at their personal test results. Finally, at the very end of the questionnaire, there was a link to these results. The respondents had the option either to follow the link, or to close the inquiry's session. The first option was treated as an action, and the second option as inaction. By doing so, we were able to collect both explicit and implicit attitudes as well as reliable data on actual behavior. The scales for both components of attitudes were recoded into "relatively positive" — "relatively negative" values, and were merged to create the four above-mentioned groups of attitude statuses.

For all the data presented hereafter, tests of statistical significance were carried out and showed statistically significant associations at the level of no less than p=0.05.

Table 3.1. Motivational power based on consistency of an attitude

Consistency statuses	Group's share	Action	Inaction
Consistent positive	45%	38%	62%
Explicit positive, Implisit negative	33%	29%	71%
Explicit negative, Implisit positive	12%	8%	92%
Consistent negative	10%	7%	94%
Total	100%	NA	NA

As the data of Table 3.1 demonstrates, the consistency status of an attitude is directly associated with the probability of actual behaviors. Following our data, one could see that the probability of action decreases, while the probability of inaction increases with every step of the scale. More data concerning TCM effectiveness was published earlier (Chernozub, 2018b, 2020b).

Since the TCM has shown some potential to explain behaviors independently of intentions, its integration into the TPB model makes *practical sense*. It is *theoretically possible* to do this within TPB's interpretation of so-called "general attitudes".

General attitudes are regarded by the TPB as one of the "background factors" of actors' "beliefs". Attitude is "general" since the TBP regards it as an overall view of the

potential actor toward a complex entity, like "the politician X", rather than toward specific actions, or like "voting for the politician X for the office Y next Sunday". The TPB suggests that general attitudes can affect not a specific action, but the style of behavior in this field. For example, it is not this person's turnout in this particular election, but their overall electoral activity for a long period of time. Concerning specific behaviors, the TPB argues that general attitudes can influence them, but through the mediation of "beliefs". Technically, that should be represented by relatively strong correlations between attitudes and "beliefs" variables in contrast to relatively weak correlations between attitudes and intentions and / or behavioral variables (Fishbein, Ajzen, 2011: 273-279).

Therefore, there are no obvious theoretical barriers to integrating the TCM into the TPB model on the grounds of its legal component of "general attitude".

According to the TPB, we should anticipate that general attitude:

- will affect the TPB "beliefs" and will not affect intentions and behaviors;
- will be a predictor of "beliefs" either with an explicit or an implicit component, but not with any combination of them.

In contrary, the TCM assumes that general attitude:

- will affect behaviors directly;
- will affect behavior depending on its consistency status.

Thus, the experimental model represents the conventional TBP structure where "background factors" of "general attitudes" is split into two components, those of explicit and implicit.

4.   Hypothesis and anticipated theoretical contribution of the study

Within this framework, the anticipated theoretical contribution of this paper includes several dimensions.

First of all, we hope to shed some light on the phenomenon of "unplanned" actions. If even a fraction of these actions can be explained by the impact of an implicit factor, then an extension of the TPB to implicit factors makes sense. Next, we see it as a chance to test the effectiveness of two competing models of behavior-factors interaction. The MODE proposes that only one component determines any given behavior. On the contrary, RIM argues that both components affect behaviors simultaneously.

The formal hypotheses are stipulated as follows;

Ho1: "The strength of associations between variables reflecting general attitudes and those reflecting the actual behaviors will be weaker than the strength of associations between variables reflecting general attitudes and those reflecting TPB "beliefs", while the latter are statistically significant".

Ho2: "The strength of associations between variables reflecting consistent status of an attitude components and variable reflecting the actual behaviors will be weaker than the strength of associations between variables reflecting each of these components and the same dependent variable, while the latter are statistically significant".

In the sociological context, the rejection of these hypotheses will lead to a better understanding of the structuration process in both directions. First of all, we will gain a better understanding of how a general attitude influences social behavior by the use of implicit / unconscious forces. That will support the model of interaction ritual chains proposed by R. Collins and probably actualize his model of microfoundations of macrosociology (1981). Next, we plan to describe the mechanics by which dispositions affect deliberate social actions, supporting the structural theory of attitude.

It will be a significant contribution to social psychology and cognitive sciences if our results support either the MODE or RIM model of implicit and explicit factors' interaction in the specific domain of "unplanned" actions.

5. The model and its operationalization, research plan

Despite the fact that TPB is wide-spread and recognized by scientists all around the world, there are several research domains where it is used especially intensively. Electoral behavior is one of them. Taking into consideration a parallel experience of applying TCM to this field, we chose electoral studies as the appropriate and accessible empirical ground for our investigation.

As the general framework for our model, we take a well-known scheme of the TBP.[6] Putting all unnecessary elements aside, we configure the model as it is shown in figure 5.1.
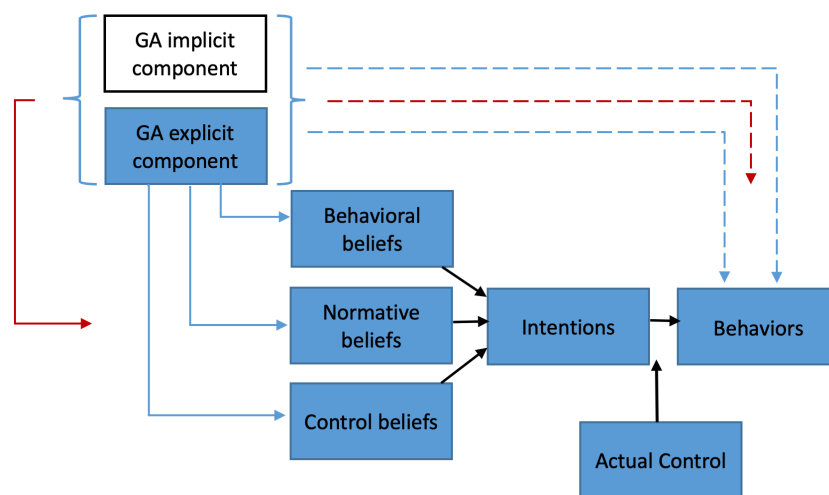

Figure 5.1. The model of the theory of planned behavior enriched by the element of two-component general attitude.

In Figure 5.1, the blue elements compose the original TPB model. One addition to it is a white rectangle, representing the implicit component of general attitudes. The black

---

6. https://people.umass.edu/aizen/tpb.background.html

bold arrows reflect the classical TPB interpretation of an action escalation process. The blue arrows point to the anticipated impact of general attitudes as per the TPB, while the blue broken ones are as per the TCM. The red broken lines represent the combined influences of two components, as assumed by the TCM.

Thus, the colored lines represent the expected effect of TPB enrichment, while the broken lines mark effects that may emerge contrary to the TPB's prediction.

<div align="center">* * *</div>

We designed an online mass poll devoted to measuring the activities of political volunteers in order to test our model empirically. The role of the respondents was defined as partisans of potential candidates for the Russian presidential elections of 2024. To eliminate the possibility of any "actual control" factor intervention, we used a simple and immediately executed form of behavior of filling out a short form, containing the respondent's contact information.[7] The disclosure of the e-mail address or telephone number in this form was considered an act of behavior. The TPB views this as incomplete behavior. However, such actions are regarded as a "commitment" to behave and a reliable predictor of behavior (Fishbein, Ajzen, 2011).

To make sure that there are no external barriers for the planned behaviors, only respondents who answered "definitely yes" to the screening question "I always disclose my contacts in the Internet if I really want to get feedback" were selected for the survey. Our belief is that this will eliminate the risks associated with disclosing contacts specific to behavioral fields.

The model was operationalized according to the recommendations of A. Ajzen[8] as well as the practical limitations of the fieldwork design. Seven variables were configured;

General attitude, explicit component (AE): "It will be helpful for people like me, if my favorite candidate takes/keeps this office".

General attitude, implicit component (AI): as per the Graphic Associative Test of Attitudes (please, see next section of the paper).

Behavioral beliefs / expectations (BB): "My help to my candidate will bring me more gains than losses".

Normative beliefs / expectations (NB): "My help to my candidate will be approved by those whose opinion I respect".

Control beliefs / expectations (CB): "Contribution such as commenting and re-posting messages on the Internet or distributing leaflets will not require any effort from me".

Intentions (Int): "If you have a chance, would you fill a contact form to get feedback from the headquarters of your candidate or not?"

Behaviors (Bh): — the act of filling out a contact form.

---

7. In Russia, an e-mail address or phone number tied to a person's name does not qualify as personal data that should be protected by law or ethics.

8. Please see https://people.umass.edu/aizen/pdf/tpb.measurement.pdf.

Self-evaluation questions (AE, BB, NB, and CB) started with "To what extent do you agree, or disagree with the following: …". For these variables, we used a four-point scale of "totally agree — rather agree — rather disagree — totally disagree". The options for answering the question about intention were "yes" or "no". To identify the actual behavior, we asked respondents to fill out a contact form as a potential volunteer for the candidate they preferred. To measure the implicit component of attitudes, we used our method of the Graphic Associative Test of Attitudes (GATA).

6. The GATA

Considering the practical limitations of the poll methodology, we developed the Graphic Associative Test of Attitude (GATA) (Chernozub, 2018a, 2018b). Methodologically, it is a modified Etkind's Color Test, ECT (Etkind, 1980, 1985, 1087), which, in turn, is a development of the 1990 Lüscher test. Initially, ECT was developed for questioning people with cognitive dysfunctions who could not understand the verbal constructs of a questionnaire well. Thus, it deliberately focused on addressing the unconscious structures of the mind.

The participants in ETC associate simple concepts like relatives, mates, friends, etc., with colors from Lüscher's "small" set. Then, respondents rate the colors as "pleasing" or "unpleasing". Thus, an individual preference-rejection scale is developed to measure the participants' implicit attitude towards the tested objects.

In politics, colors and color schemes are often significant symbols and used for political identification. For this reason, the stimulus set of the original ECT was substituted with 8 graphic shapes from the 1980 Markert Test. The shapes of the test have no political connotations and thus can be used to differentiate between electoral alternatives. Figure 6.1 depicts examples of the stimulus set found in GATA.

Figure 6.1. Examples of K. Markert Test stimuli used in the current study to measure voters' implicit attitudes.

Thus, the method's procedure was structured as follows;
a. The set of graphic shapes is presented to a respondent on the screen of a CAPI device.
b. The respondent associates graphic shapes with test objects represented by verbal concepts as they are described by an interviewer / presented on a screen.
c. The respondent's mind is turned to other issues of the survey.
d. The respondent rates graphic shapes from most attractive ("shapes that are pleasant to look at, shapes one wants to gaze at") to less attractive ("shapes that are unpleasant to look at, shapes one would not want to gaze at").

e. An "individual scale" of shape preferences is created, based on the ranking from phase "d".

f. An implicit preferences score is attributed to every concept, based on association from phase "b" and according to the "individual scale".

Here is an example; a respondent chose Shape "C" as the most preferable, and Shape "D" as the least preferred among all the shapes. Thus, Shape "C" receives the highest score of "1" and Shape "D" receives the lowest score of "8" on this respondent's "individual scale". Then, a researcher selects all the tested objects associated by this particular respondent with these shapes, and gets the valence of implicit attitude towards objects, which counts as "extremely positive" for all objects associated with the Shape "C", and as "extremely negative" for ones associated with the Shape "D". The same algorithm is repeated for all shapes and all objects.

As a result, every tested object gains a score on an ordinal scale, regardless of which particular shape may be preferred or rejected by each single respondent due to his or her psychological, cultural, national traits, or any other factors of the same kind.

7. The interim summary

The RAA, and especially the TPB, are widely recognized models for explaining and predicting behaviors based on the *explicit* factors of behavior. However, there is quite an extensive field of "unplanned" behaviors not covered by these models. Behavioral patterns of this kind are attributed to the "intention inflation" phenomenon. In turn, this inflation is explained by poor "actual behavior control".

Previous studies have shown that there are situations in which reasonable chances for "inflation" are absent and where the "actual control" is full, yet unplanned behavior still occurs.

At the same time, there is a lot of evidence that behaviors depend not only on explicit, but also on *implicit* factors. The general approach of DST has been combined with numerous theories, such as the TCM as an example. As the TCM has a successful record of studying combined explicit /implicit effects on behaviors, it may be a convenient instrument to test the idea of enlarging TPB with implicit factors attempting to explain the phenomenon of unintended behavior.

Technically, this could be realized by splitting the TPB "background factor" of "general attitude" into explicit and implicit components, leaving all other structures of the model untouched.

Will this homeopathic invasion bring some meaningful results?

We will see in the next article.

References

Ajzen I. (1991) The theory of planned behavior. *Organizational Behavior and Human Decision Processes*, vol. 50, no 2, pp. 179–211.

Ajzen I. (2019) Theory of Planned Behavior with Background Factors. Available at: https://people.umass.edu/aizen/tpb.background.html (accessed 20 November 2022)

Arrow K., Forsythe R., Gorham M., et al. (2008) The Promise of Prediction Markets. *Science*, vol. 320, pp. 877–878.

Atanasov P., et al. (2015) Distilling the Wisdom of Crowds: Prediction Markets Versus Prediction Polls. *Academy of Management Proceedings,* pp. 1–16.

Auyero J., Swistun D. (2008) The Social Production of Toxic Uncertainty. *American Sociological Review,* vol.73, pp. 357–379.

Bandura A. (1986) *Social foundations of thought and action: a social cognitive theory*, Englewood Cliffs, N. J.: Prentice-Hall.

Baumeister R. (2002) Yielding to temptation: Self-control failure, impulsive purchasing, and consumer behavior. *Journal of Consumer Research,* vol. 28, no 4, pp. 670–676.

Bell D. R., Corsten D. and Knox G. (2011) From Point of Purchase to Path to Purchase: How Preshopping Factors Drive Unplanned Buying. *Journal of Marketing*, vol. 75, pp. 31–45.

Bourdieu P. (1980/1990) *The Logic of Practice*, Stanford, CA: Stanford University Press.

Chaiken S. (1980) Heuristic versus systematic information processing and the use of source versus message cues in persuasion. *Journal of personality and social psychology*, vol. 39, no 5, pp. 752–766.

Chernozub O. L. (2018a) Revealing the affective component of the electoral attitude: creation and validation of a graphic associative test of the attitude. *Monitoring of public opinion: economic and social changes*, no 3, pp. 31–48.

Chernozub O. L. (2018b) Electoral Forecasting Based on Data on Intentions: Limits of Accuracy of the Conventional Model and Prospects for Its Development Based on Emotional Factors. *Monitoring of public opinion: economic and social changes*, no 4, pp. 3–28.

Chernozub O. L. (2020a) Implicit factors and inconsistency of electoral behavior: from a theoretical concept to an empirical phenomenon. *Monitoring of public opinion: economic and social changes*, no 4, pp. 17–40.

Chernozub O. L. (2020b) Implicit factors and inconsistency of electoral behavior: from attitude to behavior. *Monitoring of public opinion: economic and social changes*, no 5, pp. 71–89.

Chomvilailuka R., Butcher K. (2014) Social effects on unplanned in-store buying. *Social and Behavioral Sciences,* vol.148, pp. 127–136.

Conner M. T., Perugini M., O'Gorman R., Ayres K., & Prestwich A. (2007) Relations between implicit and explicit measures of attitudes and measures of behavior: Evidence of moderation by individual difference variables. *Personality and Social Psychology Bulletin*, vol. 33, no 12, pp. 1727–1740.

Collins R. (1981) On the Microfoundations of Macrosociology. *American Journal of Sociology*, vol. 86, no 5, pp. 984–1014.

Dasgupta N., Rivera L. M. (2006) From automatic antigay prejudice to behavior: The moderating role of conscious beliefs about gender and behavioral control. *Journal of Personality and Social Psychology,* vol. 91, no 2, pp. 268–280.

Devine P. (1989) Stereotypes and prejudice: their automatic and controlled components. *Journal of Personality and Social Psychology,* vol. 56, no 1, pp. 5–18.

Etkind A. M. (1980) Relationship color test and its application in study of patients with neuroses. *Social and psychological research in psychoneurology: collection of scientific papers* (ed. Bazhin E.), Leningrad: Bekhterev Psychoneurological Institute, pp. 110–114. (In Russian)

Etkind A. M. (1985) *Development of psycho-medical methods of assessment of emotional components of relationships and their applications in the investigation of neuroses and affective disorders* (PhD Thesis), Leningrad. (In Russian)

Etkind A. M. (1987) Relationship color test. *General psychodiagnosis* (ed. A. Bodalev), Moscow: MSU, pp. 221–228. (In Russian)

Evans J. (2008). Dual-processing accounts of reasoning, judgment, and social cognition. *Annual Review of Psychology*, vol. 59, pp. 255–278.

Fazio R. (1990) The Role of Attitudes in Memory-Based Decision Making. *Journal of Personality and Social Psychology,* vol. 59, no 4, p. 614–622.

Fazio R. H., Jackson J. R., Dunton B. C., Williams C. J. (1995) Variability in automatic activation as an unobstrusive measure of racial attitudes: A bona fide pipeline? *Journal of personality and social psychology,* vol. 69, no 6, pp. 1013–1044.

Fazio R. (2007) Attitudes as object-evaluation associations of varying strength. *Social Cognition*, vol. 25, no 5, pp. 603–637.

Fazio R., Olson M. (2014) The MODE model: Attitude-Behavior Processes as a Function of Motivation and Opportunity. *Dual process theories of the social mind,* New York: Guilford Press, pp. 155 — 171.

Fishbein M. (1967) Attitude and the prediction of behavior. *Readings in attitude theory and measurement,* New York: Wiley, pp. 477–492.

Fishbein M., Ajzen I. (1975) *Belief, attitude, intention, and behavior: An introduction to theory and research,* Reading, MA: Addison-Wesley.

Fishbein M., Ajzen I. (2011) *Predicting and Changing Behavior: The Reasoned Action Approach,* New York; Hove: Psychology Press.

Florack A., Scarabis M., Bless H. (2001) When do associations matter? The use of automatic associations toward ethnic groups in person judgments. *Journal of Experimental Social Psychology,* vol. 37, no 6, pp. 518–524.

Friese M., Hofmann W. (2009) Control me or I will control you: Impulses, trait self-control, and the guidance of behavior. *Journal of Research in Personality*, vol. 43, no 5, pp. 795–805.

Friedman M., Savage L. J. (1948) Utility Analysis of Choices Involving Risk. *Journal of Political Economy*, vol. 56, no 4, pp. 279–304.

Gawronski B., LeBel E. P. (2008) Understanding patterns of attitude change: When implicit measures show change, but explicit measures do not. *Journal of Experimental Social Psychology,* vol. 44, no 5, pp. 1355–1361.

Gibbons F., Gerrard M., Blanton H., Russell D. (1998) Reasoned action and social reaction: Willingness and intention as independent predictors of health risk. *Journal of Personality and Social Psychology*, vol. 74, no 5, pp. 1164–1180.

Gilovich T., Griffin D. (2002). Introduction — Heuristics and biases: Then and now. *Heuristic and biases: The psychology of intuitive judgment* (eds. T. Gilovich, D. Griffin, D. Kahneman), New York: Cambridge University Press, pp. 1–18.

Goldstein D., Gigerenzer G. (2002) Models of ecological rationality: the recognition heuristic. *Psychological Review,* vol. 109, no 1, pp. 75–90.

Graefe A. (2014) Accuracy of Vote Expectation Surveys in Forecasting Elections. *Public Opinion Quarterly*, vol. 78, pp. 204–232.

Greenwald A. G., Poehlman T. A., Uhlmann E. L., Banaji M. R. (2009a) Understanding and using the Implicit Association Test: III. Meta-analysis of predictive validity. *Journal of Personality and Social Psychology*, vol. 97, no 1, pp. 17–41.

Greenwald A. G., Smith C. T., Sriram N., Bar-Anan, Y., Nosek B. A. (2009b) Implicit race attitudes predicted vote in the 2008 U. S. Presidential Election. *Analyses of Social Issues and Public Policy*, vol. 9, pp. 241–253.

Hofmann W., Friese M., and Strack F. (2009) Impulse and Self-Control From a Dual-Systems Perspective. *Perspectives on Psychological Science*, vol. 4, no 2, pp. 162–176.

Hui S., Inman J., Huang Y., Suher J. (2013) The Effect of In-Store Travel Distance on Unplanned Spending: Applications to Mobile Promotion Strategies. *Journal of Marketing*, vol. 77, pp. 1–16.

Janz N., Becker M. (1984) The Health Belief Model: A Decade Later. *Health Education & Behavior*, vol. 11, no 1, pp. 1–47.

Joas H. (1996) *The Creativity of Action*, Chicago: University of Chicago Press.

Jordan C. H., Whitfield M., Zeigler-Hill V. (2007) Intuition and the correspondence between implicit and explicit self-esteem. *Journal of Personality and Social Psychology*, vol. 93, no 6, pp. 1067–1079.

Kahneman D., Frederick S. (2002) Representativeness revisited: Attribute substitution in intuitive judgment. *Heuristic and biases: The psychology of intuitive judgment* (eds. T. Gilovich D. Griffin, D. Kahneman), New York: Cambridge University Press, pp. 49–81.

Kahneman D. (2011) *Thinking, Fast and Slow*, N. Y.: Farrar, Straus and Giroux.

Kendrick R. V., Olson M. A. (2012) When feeling right leads to being right in the reporting of implicitlyformed attitudes, or how I learned to stop worrying and trust my gut. *Journal of Experimental Social Psychology*, vol. 48, no 6, pp.1316–1321.

Kennedy C. et al. (2016) An Evaluation of 2016 Election Polls in the United States. Available at: https://www.aapor.org/getattachment/Education-Resources/Reports/AAPOR2016- Election-Polling-Report.pdf.aspx. (accessed 10 March 2022)

Koole S. L., Dijksterhui A., van Knippenberg A. (2001) What's in a name: implicit self-esteem and the automatic self. *Journal of Personality and Social Psychology*, vol. 80, pp. 669–685.

Metcalfe J., Mischel W. (1999) A hot/cool-system analysis of delay of gratification: Dynamics of willpower. *Psychological Review*, vol. 106, pp. 3–19.

Leschziner V. (2015) *At the Chef's Table: Culinary Creativity in Elite Restaurants, Stanford,* CA: Stanford University Press.

Leschziner V. (2019) Dual-Process Models in Sociology. *The Oxford Handbook of Cognitive Sociology*, Oxford University Press.

Leschziner V., Green A. (2013) Thinking about Food and Sex: Deliberate Cognition in the Routine Practices of a Field. *Sociological Theory*, vol. 31, pp. 116–144.

Lizardo O., Mowry R., Sepulvado B., Stoltz D., Taylor M., Van Ness J., et al. (2016) What Are Dual Process Models? Implications for Cultural Analysis in Sociology. *Sociological Theory,* vol. 34, pp. 287–310.

Lizardo O., Strand M. (2010) Skills, Toolkits, Contexts and Institutions: Clarifying the Relationship between Different Approaches to Cognition in Cultural Sociology. *Poetics*, vol. 38, pp. 205–228.

Lüscher M. (1990). *The Luscher color test*, New York: Simon and Schuster.

Markert Ch. (1980). *Test Your Emotions*, Wellingborough: A. Thomas & Co.

Martin J. (2010) Life's a Beach but You're an Ant, and Other Unwelcome News for the Sociology of Culture. *Poetics*, vol. 38, pp. 229–244.

Meshi D., Tamir D., Heekeren H. (2015) The Emerging Neuroscience of Social Media. *Trends of cognitive Science*, vol. 19, no 12, pp. 771–782.

Newport F. (2008) Who are Likely voters and When Do they Matter. Gallup. Available at: http://www.gallup.com/poll/109135/who-likely-voters-when-they-matte.aspx (accessed 11 August 2021).

Patterson O. (2014) Making Sense of Culture. *Annual Review of Sociology*, vol. 40, pp. 1–30.

Perry P. (1960) Election Survey Procedures of the Gallup Poll. *The Public Opinion Quarterly*, vol. 24, no 3, pp. 531–542.

Perry P. (1962) Living Research: Gallup Poll Election Survey Experience, 1950 to 1960. *The Public Opinion Quarterly*, vol. 26, no 2, pp. 278–279.

Perry P. (1973) A Comparison of the Voting Preferences of Likely voters and Likely Nonvoters. *The Public Opinion Quarterly*, vol. 37, no 1, pp. 99–109.

Perry P. (1979) Certain Problems in Election Survey Methodology. *Public Opinion Quarterly,* vol. 43, pp. 312–325.

Perugini M. (2005) Predictive models of implicit and explicit attitudes. *British Journal of Social Psychology*, vol. 44.

Perugini M., Richetin J., Zogmaister C. (2010) Prediction of behavior. *Handbook of implicit social cognition: Measurement, theory, and applications*, Guilford Press, pp. 255–278.

Pugh A. (2013) What Good Are Interviews for Thinking about Culture? Demystifying Interpretive Analysis. *American Journal of Cultural Sociology*, vol. 1, pp. 42–68.

Ranganath K. A., Smith C. T., Nosek B. A. (2008) Distinguishing automatic and controlled components of attitudes from direct and indirect measurement methods. *Journal of Experimental Social Psychology*, vol. 44, pp. 386–396.

Rivers L., Gibbs C., Paternoster R. (2017) Integrating Criminological and Decision Research Theory: Implications for Understanding and Addressing Crime in Marginalized Communities. *Deviant Behavior*, vol. 38, pp. 74–93.

Roccato M., Zogmaister C. (2010) Predicting the vote through implicit and explicit attitudes: A field research. *Political Psychology*, vol. 31, pp. 249–274.

Rogers R. (1975) A Protection Motivation Theory of Fear Appeals and Attitude Change. *The Journal of Psychology*, vol. 91, no.1, pp. 93–114.

Rogers T., Aida M. (2012) Why Bother Asking? The Limited Value of Self-Reported Vote Intention. Harvard Kennedy School of Government. Faculty Research Working Paper Series. Available at: http://EconPapers.repec.org/RePEc:hrv: hksfac:7779639 (accessed 5 April 2020)

Rosenberg M. J. (1956) Cognitive structure and attitudinal affect. *The Journal of Abnormal and Social Psychology.* vol. 53, no 3, pp. 367–372.

Rosenberg M. J., Hovland C. I., McGuire W. J., Abelson R. P., Brehm J. W. (1960) Attitude organization and change: An analysis of consistency among attitude components. *Yale's studies in attitude and communication,* Oxford, England: Yale University Press.

Rothschild D., Wolfers J. (2011) Forecasting Elections: Voter Intentions versus Expectations. SSRN. Available at: http://stat.columbia.edu/~gelman/surveys.course/ RothschildWolfers2011.pdf. (accessed 24 May 2019).

Shah A. K., Oppenheimer D. M. (2008) Heuristics Made Easy: An Effort-Reduction Framework. *Psychological Bulletin*, vol. 134. no 2. pp. 207–222.

Sloman S. A. (1996) The empirical case for two systems of reasoning. *Psychological Bulletin,* vol. 119, no 1, pp. 3–22.

Smith E. R., DeCoster J. (2000) Dual-process models in social and cognitive psychology: Conceptual integration and links to underlying memory systems. *Personality and Social Psychology Review*, vol. 4, no 2, pp. 108–131.

Soror A., Hammer B., Steelman Z. R, et al. (2015) Good habits gone bad: Explaining negative consequences associated with the use of mobile phones from a dual- systems perspective. *Information Systems Journal*, vol. 25, no 4, pp. 403–427.

Srivastava S., Mahzarin B. (2011) Culture, Cognition, and Collaborative Networks in Organizations. *American Sociological Review*, vol. 76, pp. 207–233.

Steinmetz H., Knappstein M., Aijen I., Schmidt P., Kobst R. (2016) How Effective are Behavior Change Interventions Based on the Theory of Planned Behavior? A Three-Level Meta-Analysis. *Zeitschrift für Psychologie,* vol. 224, no 3, pp. 216–233.

Strack F., Deutsch R. (2004) Reflective and impulsive determinants of social behavior. *Personality and Social Psychology Review*, vol. 8, pp. 220–247.

Strack F., Neumann R. (2000) Furrowing the brow may undermine perceived fame: The role of facial feedback in judgments of celebrity. *Personality and Social Psychology Bulletin*, vol. 26, pp. 762–768.

Sturgis P., et al. (2016) *Report of the Inquiry into the 2015 British General Election Opinion Polls,* London: Market Research Society and British Polling Council.

Swidler A. (2003) *Talk of Love: How Culture Matters*, Chicago; London: University of Chicago Press.

Thaler Richard H. (2015) *Misbehaving: The Making of Behavioral Economics,* New York: W. W. Norton & Company.

Tufte E. (1978) *Political Control of the Economy*, Princeton: Princeton University Press.

Turel O., Qahri-Saremi H. (2016) Problematic Use of Social Networking Sites: Anteced-ents and Consequence from a Dual-System Theory Perspective. *Journal of Manage-ment Information Systems,* vol. 33, no 4, pp. 1087–1116.

Turel O., Qahri-Saremi H. (2018) Explaining Unplanned Online Media Behaviors: Du-al-System Theory Models of Impulsive Use and Swearing on Social Networking Sites. *New Media & Society*, vol. August, pp.1-25.

Turel O., Bechara A. (2016) A Triadic Reflective-Impulsive-Interoceptive Awareness Model of General and Impulsive Information System Use: Behavioral Tests of Neu-ro-Cognitive Theory. *Frontiers in Psychology*, vol. 7, pp. 1–11.

Vaisey S. (2009) Motivation and Justification: A Dual-Process Model of Culture in Ac-tion. *American Journal of Sociology*, vol. 114, pp. 1675–1715.

Vila-Henninger L. (2015) Toward Defining the Causal Role of Consciousness: Using Models of Memory and Moral Judgment from Cognitive Neuroscience to Expand the Sociological Dual-Process Model. *Journal for the Theory of Social Behavior*, vol. 45, pp. 238–260.

Wood S., Bechara A. (2014) The neuroscience of dual (and triple) system in decision mak-ing. *The Neuroscience of Risky Decision Making* (eds. Reyna V., Zayas V.), Washington, DC: American Psychological Association, pp. 177–202.

Теория (не)запланированного поведения?
Как наши прогнозы поведения страдают от «незапланированных» действий

Чернозуб Олег
Кандидат социологических наук,
Федеральный научно–исследовательский социологический центр РАН,
Адрес: ул. Кржижановского, д. 24/35, к. 5, Москва, 117218, Россия
E-mail: 9166908616@mail.ru

Будучи весьма влиятельной в микросоциологии, Теория запланированного поведения (ТЗП) предлагает одну из самых популярных технических моделей прогнозирования социального действия. Её центральным пунктом выступает допущение, что намерения являются *обязательными* посредниками между исходными факторами поведения и соответствующими действиями. Если некоторые люди отказываются от своих намерений, ТЗП интерпретирует это как то, что они были «обесценены» под давлением внешних факторов. ТЗП не претендует на объяснение этих факторов, просто подчеркивая, что существует разрыв между «воспринимаемым» и «фактическим» контролем поведения. Таким образом, возникает концепция «незапланированного поведения», вызванного действиями неконтролируемых внешних факторов.

Настоящая статья предлагает альтернативный подход к проблеме. В ней мы проверяем предположение о существовании неких факторов, которые могут объяснять «незапланированное» поведение исходя из *внутренних* закономерностей процесса эскалации действия, но пока не учитываются существующей моделью ТЗП. Оставаясь в рамках социологической интерпретации, предлагаемой теорией двойственных систем, примером этих пока еще неучтенных факторов мы выбрали имплицитный компонент общей установки. Доказательство воздействия этого фактора на поведение *в обход намерений* дает

нам возможность распространить модель ТЗП по крайней мере на некоторые разновидности поведения, считающегося на данный момент «девиантным» по отношению к теоретически предсказанному.

В теоретическом плане это может привести к реструктуризации базовой модели ТЗП путем ее обогащения этим не учитываемым на данный момент фактором. Практическое значение нашей работы будет состоять в том, что некоторые области «незапланированных» действий станут доступными для прогностического анализа.

Ключевые слова: факторы поведения; двухкомпонентная модель факторов поведения; эксплицитные факторы; имплицитные факторы; установка, структурная теория установки; двойственный процесс; теория двойственной системы; подход рационального действия; теория запланированного поведения; ГАТО; ТЗП; DST; RAA; MODE; RIM.