CHAPTER 14
Perish the Forethought: Premeditation Engenders Misperceptions of Personal Control

Carey K. Morewedge, Kurt Gray, and Daniel M. Wegner

ABSTRACT
People are normally encouraged to engage in premeditation—to think about the potential consequences of their behavior before acting, indeed, planning, considering, and studying can be important precursors to decision-making, and often seem essential for effective action. This view of premeditation is shared by most humans, a kind of universal ideal, and it carries an additional interesting implication: Even the fact that premeditations occurred can serve as a potent cue indicating voluntary action, both to actors and observers. In legal and moral contexts, for example, actors are seen as especially culpable for the consequences of their actions if those consequences were premeditated, whether or not the premeditation influenced the decision. In this chapter, we review evidence indicating that even irrelevant premeditation can lead people to believe that an actor's consequence were under personal control. We present research exploring how various forms of premeditations—including foresight, effortful forethought, wishful thinking; and the consideration of multiple possible outcomes of action—may lead actors to prefer and to feel responsible for action outcomes even when this premedication has no causal relation to the outcomes.

Keywords: Premeditation, rational action, actor's perceptions, decision-making, complete control, random control, no control, priority, prior knowledge, delayed knowledge, consistency, intention, choice blindness, exclusivity, situational constraints, external influences, obedience experiments, cognitive dissonance, facilitated communication, controlled effort, lubeka error, meta-desires, counterfactual blame, dispositional bias, unconscious deliberation

"Except only the defendant's intention to produce a given result, no other consideration has affected our feeling that it is or is not just to hold him responsible for the result as its foreseeability."—Friedman, (1929, p. 1134). Legal Cause. Harvard and James. (cited by Hart & Honore, 1959/2002, pp. 254)

It feels necessary to think carefully before making important decisions. Whether buying a house, picking a spouse, or deciding to have children, it seems wise to make a decision quickly, or to simply pick the first option we consider. Even relatively uncontrollable choices are preceded by significant forethought. When buying a new digital camera, we might read Consumer Reports, consider features such as lenses and weight, and try to imagine which would be better suited for our next family gathering or vacation. We engage in such forethought because premeditated decisions—choices guided by prior conscious deliberations of alternatives and their consequences—are considered superior to decisions made on the fly or on its absence. Our parents, teachers, and peers continually advise us to "Look before you leap" and "Think before you speak."

Prewritten decisions appear to determine the behavior most under our control, and behavior we control is presumed to be better than behavior we do not. Indeed, both the legal system and society at large view the presence of premeditation as the most important indicator of rational action (Denno, 2000).

Premeditation plays an important role in these self-control dilemmas such as deciding whether to spend or to save, eat or diet, and engage in risky or safe behavior. Its presence suggests that not only were we aware of the consequences of our behavior, but our power to act rationally and control that behavior. Consequently, we blame ourselves more when lapses in self-control were premeditated than when they were not premeditated (Klimchuck, 1994). Buying a new car impulsively may seem rash, but doing so after considering whether to put the money aside for your child's college education seems both rash and senseless. Deciding to order steak tartare seems like a mild indulgence, whereas ordering that steak after considering healthier options seems both indulgent and irresponsible. This is also true when viewing the actions of others, as we sympathize less with those who are injured if they had consciously considered (and then ignored) ways to protect themselves in advance (e.g., wearing a helmet). No matter what the domain, it appears that the presence of premeditation is an important indicator of the extent to which people possess self-control.

Determining whether an act was premeditated is considered to be one of the primary tasks of modern legal systems (Denno, 2003). When a person is charged with a crime, the jury is asked to determine whether the defendant actually committed the act, or, "guilty mind," refers to whether the defendant intentionally committed the crime—usually synonymous with the actus reus. In the legal setting, the actus reus, or "guilty act," refers to whether the defendant intentionally committed the crime—usually synonymous with the actus reus of the defendant. A conviction for the same action is based on a premeditated action, but these differences in attribution result in markedly different outcomes. The recommended sentence for a given offense (e.g., a premeditated killing) is 10 years in prison (United States Sentencing Commission, 2004). The difference in idiom for these otherwise identical actions highlights the importance society attaches to premeditation when determining whether actions were under personal control.

Despite frequently making premeditated decisions and making inferences about decisions made by other people, we are often ignorant of what premeditaion specifically entails. We may recognize intuitive level when an action is deemed...
Figure 14-1. The diagram above depicts ideal premeditation, as concieved by society and the law. It assumes that premeditation influences both feelings of control and actual control to a similar degree, resulting in better decisions. An alternative, actual premeditation, is presented in the diagram beneath it. It suggests that premeditation influences feelings of control, but may not influence one's actual control over decisions or lead to better decisions.

The law suggests that premeditation may influence both our feelings of control and actual control over our actions and the outcomes they produce (as created in the top half of Fig. 14-1). Alternatively, in spite of the importance placed upon premeditation, it may often be incidental. In other words, premeditation may fail to influence our decision making, even when we feel certain that it determined the outcome we chose. Like superstitions, fans who believe they can influence the outcome of a football game by crossing their fingers or wearing the jersey of their favorite player, premeditation may be an ideomotor ritual. We suggest that although premeditation may increase feelings of self-control, it may not serve as a reliable indicator of actual control. Conscious thoughts may only be tenuously linked to our actual behavior, and in such situations, the presence of premeditation may trick us into feeling that we controlled an outcome (as illustrated by the bottom half of Fig. 14-1). Consequently, if premeditation leads to the experience of self-control without providing authentic control, then the increased guilt and self-deception we experience after succumbing to the vices we tried to resist may be largely unwarranted.

**Actors' Perceptions**

Each of us has experienced what it feels like to have successfully made a decision—we desired some outcome and persevered until it was produced. We also know what it feels like to have done something without thinking about it in advance or consciously making a decision ("How did I end up with this bottle of chocolate pudding and a baileys?""). What distinguishes between each "premeditated" decision and an "unmediated" behavior—what leads us to feel that outcomes were intentionally chosen or unintentionally produced? Drawing from Apparent Mental Causation theory (Wegner 2002, 2005; Wegner & Wheatley, 1999) and Rational Choice theory (e.g., von Neumann & Morgenstern, 1944), we suggest that there are five basic requirements that reflect the general structure of premeditated decisions.

**Mental Decisionmaking**

Premeditated decisions begin with the identification of a problem or an unfulfilled goal, whether minor ("What should I eat for lunch?") or major ("Should I have surgery or try physical therapy?"). Once a problem or goal has been identified, information is gathered about the alternatives that are available ("Peanut butter and jelly again, or pizza?") such as each alternative's positive and negative consequences. After identifying an alternative as satisfactory or the best available (Schwartz et al., 2002; Simon, 1957), controlled effort is applied in an attempt to bring about the outcome one desires (e.g., spreading preserves, putting a plate in the microwave, or consulting a second physician). Whether evaluating the choice of a meal or medical procedure, one may thus consider the fulfillment of five criteria to determine if an outcome was premeditated. Premeditation appears to be thought that (1) is used to identify a preferred option from a set consisting of multiple alternatives, (2) occurs prior to the outcome produced, (3) is consistent with the outcome produced, (4) is explicitly related to the outcome, and (5) leads to the application of effort to bring about the outcome.

Although thought that fulfills each of these criteria will lead us to feel that an outcome was premeditated and under our control, all of these need not necessarily be fulfilled for us to feel that we are in control. Rather than a strict checklist, these factors appear to form a set of rough guidelines. The presence of some of these factors in situations in which we lack intent may erroneously suggest that we possessed control over an outcome that we did not. In other words, purely incidental thoughts may lead us to experience the feeling of control, fooling us into believing those outcomes were produced by our premeditation.

**Requirement 1: Multiple Potential Courses of Action**

The first guideline indicating that an outcome was premeditated and under our control is the existence of multiple alternatives, whether they are real or illusory. This can include having considered two or more alternatives, having considered whether to produce a single outcome, or having the potential to have considered nartives. When deciding what to eat for dinner, leftover pizza may be the only food left in the refrigerator. You may have eaten it 99% of the time in similar past instances, but you still feel like you have control over your dinner selection because you know that you ordered delivery from a neighborhood restaurant you are just as likely to eat the leftover at home as you would be if you got it to go for solitary confinement. In the case of most cases we may see option that is dictated by our habits or cues (e.g., to eat a salad), and only are we to have been intentionally chosen if we also considered its alternatives (Fiske, 1989).

The availability of multiple possible outcomes may be a legitimate requirement for a premeditated decision; yet there are instances in which it is not. Alternatives to the outcome produced were realistic or feasible, and still these presence of these situations feel like we were in control. One outcome may be so preferable that its alternatives would be selected (e.g., "Hamm...looks like pizza or dog food," and "Honey, would you like to watch Dr. Strangelev or a documentary root canal tonight?"). Desirable alternates are obvious and may or may not be feasible. For example, "Should I buy the ford or the Mazda socially ("Should we have beef brisket or a neighborhood barbeque?"). In short, these situations are not always as clear-cut in which actors may believe that alternatives were avoided or taken of a decision.

Conversely, we often feel no control over our premeditated decisions when alternatives to the course of action we select are ignored. Deciding not to act or simply discounting current course of action (i.e., maintaining status quo), are often not perceived to be in action. Avoiding or delaying a decision, or a someone else to make a decision for us, or
not usually perceived as decisions (Anderson, 2008). Perhaps this is why we generally consider ourselves and others less responsible for outcomes that result from a decision not to act (i.e., acts of omission) than for identical outcomes produced by an action (i.e., acts of commission; Spranca, Misch, & Baran, 1991).

As we believe that a decision was premeditated when alternatives to the chosen outcome were unfeasible and that no decision was made when non-obvious alternatives were present, the mere presence of alternatives may engender the feeling of control—whether we could have chosen those alternatives or not. A series of art selection experiments (Morewedge, Wegner, & Vosgerau, 2009) explored this possibility by testing whether we are more likely to consider outcomes to be under our control when alternative outcomes are present at the time of selection, but cannot actually be selected.

Participants randomly "selected" one of two works of art to see for 20s on each trial in a thirty-trial experiment by pressing a key on the right or left of their keyboard. The term selected is used because participants had no real control; there was no consistent relation between the button they pushed and the artwork they saw. Sometimes the right and left keys corresponded to the works on the right and left, respectively. Other times those keys corresponded to works on the left and right, respectively. Thus, in some they were randomly hitting keys, and the computer was randomly presenting photographs and paintings. Importantly, participants were informed of the lack of consistent correspondence between the keys and artworks at the beginning of the experiment.

Before randomly selecting a photograph or painting, participants saw thumb-sized previews of both, one, or none of the artworks they could see in that trial (see Fig. 14-2). At the end of each trial, participants reported the extent to which they felt they controlled the outcome of the selection, and whether the artwork selected was the artwork they intended to see. There were signals that created a sense of participants' perceived control over the selection of outcomes. Although people often claim to control outcomes that are purely random (Clinger, 1975), notice that these selections were equally random, regardless of the number of previews participants saw in the beginning of each trial.

If participants reported feeling more control over the selection of artwork in trials when they saw more than fewer previews, it would appear that participants used the mere presence of alternatives to infer the extent to which they controlled the artwork selected. They did just that. Participants were more likely to report feeling control over the works selected when both of the artworks were presented than when only one work was previewed. And they were more likely to report feeling control over one work selected when only one work was previewed than when neither work was previewed—even when the work previewed was unnecessary with the work selected. In short, the greater the number of previews seen before a selection was displayed, the more control participants felt over the selection, whether or not the preview matched the randomly selected outcome (Morewedge et al., 2009, Experiment 1).

A second experiment manipulated the number of alternatives previewed and whether participants could actually control the selection (Morewedge et al., 2009, Experiment 2). In some conditions participants saw two, one, or no previews of the works of art they could see in each trial (within subjects). Control over selections was determined between subjects. Participants in a true control condition could control the paintings they selected (the left and right keys corresponded to the left and right artworks at trials). Participants in a random condition randomly selected paintings as described in the previous experiment, and participants in a random assignment condition simply played a space game to have the computer program randomly select a work for them.

If participants were simply confused about how much they controlled the selection process in the previous experiment, we would expect that those in the true control and random assignment conditions would report similar feelings of control, but both groups would report feeling more control than participants in the random assignment condition (whose belief was held to be fairly clear). Participants in critical trials a certain object was presente and the confederate subtly pushed the participant to select it. On these critical trials, participants were informed that the selected object was the object they had selected. Participants reported feeling more control over the selection of the object in 20s than after the selection was made. In other words, thoughts occurring prior to an outcome were perceived to produce it.

Perhaps prior knowledge of an alternative also plays a role in being considered as a result of one's premeditated decision. Morewedge et al. (2009) examined this possibility in a study comparing participants in a prior knowledge condition and a delayed knowledge condition randomly selected a works of art to see in a paradigm similar to the art selection experiment in the prior knowledge condition, participants saw two, one, or no thumb-sized previews of works of art before they randomly selected a work to see for 20s. In delayed knowledge condition, participants saw two, one, or no thumb-sized previews of works of art after they randomly selected a work to see for 20s. Before the work they selected, both groups of participants received the same information about the options available in the trial, only those in the prior knowledge condition knew those options before making a selection.

As in the other experiment, participants in the delayed knowledge condition reported feeling more control over their selection when they saw more than fewer previews. Participants in the delayed knowledge condition, however, reported feeling equivalent control over results irrespective of the number of post-views they saw in trials, and also reported feeling less control than participants in the prior knowledge condition. Although participants in pre and post-views, only participants in
saw the alternatives in advance left them personally controlled outcomes. In other words, even though all works were randomly selected, participants felt control over selections only when the priority requirement was fulfilled. Thus, people appear to consider outcomes to be result of their decisions only when their alternatives were considered beforehand, even when that consideration was purely incidental.

Requirement 3: Consistency

For an outcome to be considered the product of a premeditated decision, it must presumably be consistent with the thoughts preceding it. Thus, we think about eating hamburgers all day and find turkey on our dinner plate, we may question how it got there. Expect outcomes to conform to our thoughts and use the consistency between the two to determine which outcomes we controlled. In a laboratory experiment, people examine their thoughts just before an outcome to determine if they consciously willed it (Wegner, 2002, 2003). In a legal domain, people examine the thought of defendants to assess how much punishment they deserve for the crimes they committed. If a killer said, “I thought about how I could kill Roger with a blow to the head,” she would presumably be incarcerated for a long time. On the other hand, if she said, “I thought about how I could kill a nail and discovered that I had hit Roger instead,” the inconsistency between her thought and the outcome suggests that she did not plan to kill Roger or control the action that did (Hart & Honoré, 1959/2002).

Even when outcomes are produced by chance, consistency between intention and outcome may give rise to the feeling that we controlled those events through skill rather than chance (Langer, 1975, 1983; Langer & Roth, 1975). One implication of the consistency requirement is that people should take more credit for their successes (which they are likely to imagine) than their failures (which they would prefer to ignore), a tendency that has been demonstrated to be robust (for a review, see Miller & Ross, 1975). Indeed, this tendency was robust that people even took credit for the outcomes they merely intended to produce. People praise themselves for simply intending to help the needy, for example, whether or not they actually did (Krueger & Gilovich, 2004). Described people appear to be one of the few exceptions to this pervasive tendency (Alloy & Abramson, 1979), as they claim less responsibility for successes than do nondepressed people.

Not only can the consistency principle lead us to feel control over the things we did not cause, it can lead even those of us who are still to believe we possess supernatural powers. In one study, participants were asked to stick pins into the head of a wooden doll made to resemble a confederate of the experimenter. Participants were more likely to report feeling personally responsible for the confederate suddenly experiencing a headache if they were previously led to dislike the confederate (i.e., who showed up late to the study wearing a tuxedo that emphasized the motto, “Stupid People Shouldn’t Breed”), than if they were not previously led to dislike the confederate (i.e., who showed up on time and was dressed instead) (Pronin, et al., 2006).

It seems that thoughts only need to appear consistent with outcomes for us to claim that outcomes were intentionally produced. Indeed, decision makers can be led to believe that they have an option they actually rejected. Such blind spots are typically produced by having people pick between two similar alternatives and then tricking them into believing they selected the unchosen alternative. In one demonstration, men were shown pairs of cards depicting similar women and asked to choose which woman was more attractive (Johnson et al., 2003). They then explained why they preferred the woman they chose. On chance blindspots, the experimenter (who was a magician) said all the women were the same, but she preferred the woman he said was the same, because she picked the woman he said was the woman he said was the same. Thirty percent of the people completely missed the switch! Even more surprising is the tendency to give reasons for having chosen the woman they had actually rejected.

Cues that make it more difficult to feel responsible for outcomes—those endangering the I another human being—may be abrogated.

Figure 14-2. Examples of previews and views depicting two, one, and no works of art were used in art selection experiments. (Top row: Examples of distorted previews in the bottom row. Each preview was 600 x 600 wide and presented pixel from the center of a 17" monitor with a resolution of 1024 x 768.)

information that was irrelevant or unattainable. Perceived control was unrelated number of previews they saw. It appears outcomes need not be consistent with the preferred choice. Rather, the outcome of a task must be consistent with at least some possible alternatives. These findings suggest a general rule of thumb for evaluating the consistency between intentions and outcomes, we reconstruct the different outcome we originally int test of some aspect of this more or less successfully flipped a coin so it turns up heads five times in a row—may give rise to the feeling that we controlled those events through skill rather than chance (Langer, 1975, 1983; Langer & Roth, 1975). One implication of the consistency requirement is that people should take more credit for their successes (which they are likely to imagine) than their failures (which they would prefer to ignore), a tendency that has been demonstrated to be robust (for a review, see Miller & Ross, 1975). Indeed, this tendency was robust that people even took credit for the outcomes they merely intended to produce. People praise themselves for simply intending to help the needy, for example, whether or not they actually did (Krueger & Gilovich, 2004). Described people appear to be one of the few exceptions to this pervasive tendency (Alloy & Abramson, 1979), as they claim less responsibility for successes than do nondepressed people.

Not only can the consistency principle lead us to feel control over the things we did not cause, it can lead even those of us who are still to believe we possess supernatural powers. In one study, participants were asked to stick pins into the head of a wooden doll made to resemble a confederate of the experimenter. Participants were more likely to report feeling personally responsible for the confederate suddenly experiencing a headache if they were previously led to dislike the confederate (i.e., who showed up late to the study wearing a tuxedo that emphasized the motto, “Stupid People Shouldn’t Breed”), than if they were not previously led to dislike the confederate (i.e., who showed up on time and was dressed instead) (Pronin, et al., 2006).

It seems that thoughts only need to appear consistent with outcomes for us to claim that outcomes were intentionally produced. Indeed, decision makers can be led to believe that they have an option they actually rejected. Such blind spots are typically produced by having people pick between two similar alternatives and then tricking them into believing they selected the unchosen alternative. In one demonstration, men were shown pairs of cards depicting similar women and asked to choose which woman was more attractive (Johnson et al., 2003). They then explained why they preferred the woman they chose. On chance blindspots, the experimenter (who was a magician) said all the women were the same, but she preferred the woman he said was the same, because she picked the woman he said was the woman he said was the same. Thirty percent of the people completely missed the switch! Even more surprising is the tendency to give reasons for having chosen the woman they had actually rejected.

Cues that make it more difficult to feel responsible for outcomes—those endangering the I another human being—may be abrogated.
we receive direction from an authority figure. The suggestions of an authority led teachers in Milgram's experiments to believe that they were forced to, rather than decided to, expose a learner to levels of electric shock that could prove fatal, even though teachers had full control over the fate of learners and had the option to disobey the authority figure.

Like the other requirements for premediation, it appears that perceived rather than actual exclusivity is crucial when determining personal control over outcomes. We can be easily led to ignore real exclusivity for outcomes caused by external forces. For example, we take full responsibility for and generate reasons why we produced actions that were performed because they were suggested by a hypnotist (Westley & Haidt, 2005), or why we made decisions that were due to irrelevant contextual influences such as the order in which options were presented (Nisbett & Wilson, 1977).

The tendency to confuse exclusivity has important implications, as in the case of facilitated communication—a technique in which a facilitator (usually a therapist) holds the hand of a patient (e.g., an autistic child), and interprets their slight movements as meaningful responses to questions posed to the patient. Although it sounds like a good idea in theory, in practice facilitators answer the questions themselves and attribute their answers to the patients (Wegner, Fuller, & Spirt, 2003).

**Requirement 5: Effort**

Once an outcome has been chosen, the translation of that thought into action requires controlled effort (James, 1890/1955), which appears to be the final requirement for an outcome to be perceived as premeditated. As a result, outcomes chosen out of habit that are easy to perform feel less controlled than those that are unusual or difficult (Fiske, 1989).

Perhaps this is because effort is only exerted during the process of decision-making, as evidenced by a decreased ability to perform effortless tasks after having made a decision. Like the performance of tasks requiring self-control, making judgments and decisions appears to deplete a limited resource that some have labeled will-power (Mascaro & Baumeister, 2008; Vohs & Faber, 2007). In fact, in the best-illustrated experiment, participants were placed in a room for five minutes with a plate of freshly baked chocolate chip cookies and a plate of radishes. Participants instructed to eat only the contents of a subsequent (impossible) task more quickly than controls and those allowed to eat only cookies (Baumeister et al., 1998). Presumably, putting one's desire to eat the cookies (and participants' ability to resist in the subsequent task).

Expending effort while an outcome is produced, however, may mistakenly lead us to believe that we are responsible for producing it. These Euroka errors are particularly likely when we expend mental or physical effort during the generation of a solution to a problem presented in a forum, to a study, participants were paired with a partner and asked to solve anagrams together (Preston & Wegner, 2007). When participants were asked to squeeze a handgrip with thinking of solutions, they claimed credit for the solution, regardless of whether they or the partner solved it. Similar effects were found in other experiments: participants were more likely to falsely claim credit for solutions to anagrams when the anagrams were displayed in a difficult-to-read font than an easier-to-read font. Participants were thus likely to feel responsible for an outcome when they engaged in effortful thinking during its production.

Indeed, merely engaging in effortful thinking about anything before producing an outcome may lead us to claim more control over that outcome, even when it was randomly produced. In another art selection task, participants saw thumbnail previews of the work of art that could be selected in each trial. After two-thirds of trials, participants performed an additional task before selecting artwork. At the time, participants answered a relevant question—what they were thinking and feeling alternatives they considered prior to production. Observers have a more difficult task, as they must infer which thoughts and alternatives actors considered. Although actors and observers differ in how the uniquely attributable responsibility for outcomes (Gilbert & Fiske, 1995; Jones & Harris, 1976; Ross & Nisbett, 1991), others who believe that they possess knowledge of the prior thoughts and alternatives available to actors judge premediation according to the criteria that actors Observed examine whether actors had the ability to consider or choose from a have foreseen and desired to produce the come, whether actors' intentions appear to be the sole cause of the outcome, and whether actors expended toward creating the outcome produced (Pizarro, Ullmann, & Bloom, 2008; Slaver, 1988; Weiner, 1992). Like actors, observers may merely examine whether these requirements appear to have been satisfied. Observers who do not believe they possess such knowledge judge premediation making more general inferences about actor and the apparent goal of the outcome produced. In both cases, however, these inferences are made under uncertainty. Obser- judgments may thus substitute their own intuitions and emotions for evidence when no available (Haïd, 2001; Kahneman & Tene 2002; Tene, Schloske, & Sunstein, 1999).

Furthermore, observers may be more motivated to indicate that the requirements have been met in order to validate their feelings and intuitions that someone should be praised or blamed for the outcome (Alicke, 2008; Haïd, 2001; & Wegner, in press; Kahneman, Schloske, & Sunstein, 1999). Indeed, such intuitions unlikely to be corrected, as people generally believe their judgments are veridical assessments of the world (Nisbett & Wilson, 1977; Pronin, Gilovich & Ross, 2004). Altho observers may examine whether actions or the five requirements actors use are independent of premediation, observers' examination of these requirements is often cursory, merely an attempt to justify the attribution of praise blame.  

**Perish the Forethought**

Half of the time, participants answered irrelevant questions such as, "What word do you associate with tube socks?" and "What's a fair price for a banana cream pie?"

Although participants reported more control over our trials in which they performed an additional task, the results of this study make it clear that the content of the task did not matter. Relative to no-task trials, participants reported feeling prouder, but equal amounts of control over the trials in which they answered relevant and irrelevant questions. Regardless of whether their thoughts were relevant to the task at hand, participants felt more control over outcomes after having thought about something—anything—before the outcome was produced (Morewedge et al., 2009; Experiment 5).

**Summary**

These five sections outline the necessary components of premediation, which give rise to the experience of control over the outcomes of decisions, and suggest that their presence often leads people to believe we controlled them. Multiple alternatives need merely be present, not possible, to make outcomes feel like the product of our decisions. These alternatives must appear in advance of the decision, regardless of whether they are actually chosen, to make the outcome feel like it was under our control. Even when we have no real choice, we feel that we determined outcomes when they appear consistent with our intentions and free of external influence. Finally, my kind of thinking before a decision, whether stated or not, appears to lead to the perception that an outcome was the result of a premeditated decision—that our thoughts and actions contained them. Although premediation may indicate that we considered our options before making a decision, we appear to have difficulty determining when it did and did not lead to the production of the outcomes we intended.

**Observers' Perceptions**

When determining whether an outcome was the result of a premeditated decision, actors have the privilege of knowing the thought
Requirement 1: Multiple Potential Courses of Action

Observers are most likely to consider an outcome the result of a premeditated decision and thus control when actors appear to have had multiple alternatives from which to choose. In some cases, observers are more likely than actors to believe that alternatives were possible, as they tend to perceive that actors could have produced an alternative outcome even when actors were unaware that alternative existed. Wells and Gavanski (1989), for example, asked people to assess an employer's responsibility for indirectly killing his employee by ordering an entire container of the lethal ingredient to which she was highly allergic. In one version of the scenario, the employer selected between two entrails for the employee, both containing the lethal ingredient. In the other version, only one of the two entrails contained the lethal ingredient. Although the employer was unaware of her allergy in both scenarios, he was seen as having greater control over her life and death than when only one entrail was fatal than when both were fatal. Of course, the employer had no real control over her fate in either scenario—in both cases he did not know that either entrail would kill her employee. Yet, others inferred that because the employer could have chosen a nonfatal entrail, the employer was more responsible for causing an entrail that killed her.

Requirement 2: Priority

Retrospectively discerning whether outcomes were foreseeable at the time of judgment is a challenging task for observers. A core of knowledge—knowing with certainty the events that occurred—hinders observers' ability to imagine actors' thoughts when faced with a decision (Camerer, Loewenstein, & Weber, 1989). Knowledgeable observers may have difficulty conceptualizing a situation in which actors were not aware of all of the consequences of the outcome chosen. Children have particular difficulty accounting for knowledge that they possess when predicting naive actors' behavior (Wimmer & Perner, 1983). Although adults are influenced to a lesser degree by prior knowledge than children, they are still likely to be initially egocentric (Epley, Mosherd, & Keysar, 2004). The certainty hindsight provides also makes the foreseeability of an outcome seem greater, even influencing rape judgment (Fischhoff, 1975). It is difficult for observers to discern actors' thoughts at the time of judgment and ignore knowledge of the outcomes of those actions.

Requirement 3: Consistency

Consistency between an actor's prior thought or desire and an outcome lead observers to consider actions premeditated, whether or not the actor's thoughts and desires could influence the outcome. Woolfolk, Dorus, and Darley (2001) showed that actors are held more culpable for actions they intended, even if their intention did not influence the action. Observers read a vignette in which a protagonist was given a gun by terrorists that made him powerless to resist their command to kill a man, and then might have reason to believe that the protagonist had thought about killing the man and wanted him to live. In both cases, the protagonist had control over the outcome he produced (the man's death), but observers ascribed more blame to the target when the outcome was consistent than inconsistent with his previous desires.

Consistency between the outcome that occurred and the outcome an actor intended to produce, however, does not appear to be insufficient for an act to be considered the result of premeditated decision. Observers are similar to the consistency between the action intended to produce an outcome and the action that actually produced it. A person intending to kill his wife's. The outcome he actually produced. The agent intending to kill his wife's. The sequence of events producing his uncle's death were consistent with the sequence he planned to execute. When actors are unsure of actors' prior intentions, they may base judgments of premeditation on the consistency between outcomes and their lay theories of actors' general inclinations or meta-desires. People are considered more blameworthy for moral transgressions that appear to have been committed impulsively than moral transgressions that appear to involve premeditation ("She doesn't really dislike me—she just chewed me out because she was drunk."). Because most people have a meta-desire to do good (Pizarro, Bloom, & Slory, 2003). Interestingly, this suggests that actors who are generally perceived to desire to do evil are not excused from imputing immoral acts because those acts are considered consistent with their meta-desires. Finally, observers occasionally engage in attribution substitution (Kahneman & Frederick, 2002), overextending consistency to include unintended side effects of the outcome produced. In the Wells and Gavanski (1989) case mentioned before, observers overextended the consistency between an employer's intention (i.e., to select one entrail for his employee's) and action (i.e., selecting an entrail for his employee's) to include an unintended side effect (i.e., his employee's death). People are held similarly accountable by the law for unintended consequences of their actions, if the actions themselves were premeditated (Hart & Honore, 1959/2002). In a celebrated case, a man and an exotic dancer competed to rob a rich client. The dancer strangled the client in his car until his accomplice opened the car door and pointed a gun at the client. Although her accomplice had no desire to harm the client, she clipped a patch of ice and pulled the trigger. The client was killed by the gun but the accomplice was convicted of first degree murder because he was engaging in an intentional illegal act (Alicke, 2000). Observers are especially likely to attribute unintended side effects to actors' intentions when the ou and original intention are similar. A per considered more culpable for having caused a car accident while speeding, for exam when he was rushing home to hide a will of oil than to hide an anniversary gift. In this criminal intentions to hide an illegal sub presumably were generalized to include a tentiously harmful outcome (Alicke, 1992).

Requirement 4: Exclusivity

Under ordinary circumstances, for a variety of reasons, observers tend to assume that a behavior was due to their intentions and situations (Gilbert & Malone, 1995; Ichniwer, Jones & Davis, 1995; Jones & Harris, 1995). For example, observers are especially sensitive to actors' meta-desires to avoid doing bad. Conversely, people are not considered more praiseworthy for good behaviors committed impulsively than good behaviors that appear premeditated, because most people have a meta-desire to do good (Pizarro, Bloom, & Slory, 2003). Interestingly, this suggests that actors who are generally perceived to desire to do evil are not excused from imputing immoral acts because those acts are considered consistent with their meta-desires. Finally, observers occasionally engage in attribution substitution (Kahneman & Frederick, 2002), overextending consistency to include unintended side effects of the outcome produced. In the Wells and Gavanski (1989) case mentioned before, observers overextended the consistency between an employer's intention (i.e., to select one entrail for his employee's) and action (i.e., selecting an entrail for his employee's) to include an unintended side effect (i.e., his employee's death). People are held similarly accountable by the law for unintended consequences of their actions, if the actions themselves were premeditated (Hart & Honore, 1959/2002). In a celebrated case, a man and an exotic dancer competed to rob a rich client. The dancer strangled the client in his car until her accomplice opened the car door and pointed a gun at the client. Although her accomplice had no desire to harm the client, she clipped a patch of ice and pulled the trigger. The client was killed by the gun but the accomplice was convicted of first degree murder because he was engaging in an intentional illegal act (Alicke, 2000). Observers are especially likely to attribute unintended side effects to actors' intentions when the or and original intention are similar. A per considered more culpable for having caused a car accident while speeding, for exam when he was rushing home to hide a will of oil than to hide an anniversary gift. In this criminal intentions to hide an illegal sub presumably were generalized to include a tentiously harmful outcome (Alicke, 1992).

One notable exception to this correspondence bias is observers' tendency to attribute counterfacial blame (Miller, Visser, & S 2005). When the constraints of the situ are so severe that there are no possible native causes of event available, obbl dispositionalism is sometimes so strong they assume actors' intentions were cause to their behavior. Miller and colleagues (2005) showed a person taking a test with or without strict supervision to observers and then a observers to assess the test taker's character. When the test taker was under strict supervision, observers considered him less trustworthy than when the test taker was under no supervision. Observers assumed that she would
cheated in the latter case if there were weaker situational constraints. In short, observers appear to consider exclusivity quite differently than do actors. They generally perceive actors to have controlled actions that were performed as a result of substantial coercion and believe they can infer actors' intentions even when actors are forced to perform the actions they do.

**Requirement 5: Effort**

Although observers often discount the influence of the situation in attributing responsibility, certain outcomes appear premeditated because of the substantial effort required to enact them. In any situation, there is usually a course of action that is normative, and when a counter-normative or unusual action is observed, it is thought to have been consciously chosen. For example, most people buy groceries at the supermarket, and it is assumed that the person only purchases groceries from a small co-op may lead you to believe that they have real costs associated. Similarly, most people drive at or above the speed-limit, so we may infer that a person driving more slowly than the limit intends to do so, assuming we do not simply infer that the driver is incompetent (Morewedge, Preston, & Wegner, 2007). Choosing such mundane alternatives is often called making the "hardest choice" (Fiske, 1989), a term implying that the decision maker was not only aware of the alternative but possessed both the cognitive resources and sufficient control over the situation to reject the modal response (Gilbert, 1991; Shiv & Federicklin, 1999).

**Summary**

Observers appear to evaluate the same requirements actors do when discerning whether an outcome was due to a premeditated decision, and like actors, they often evaluate those requirements in a curvilinear manner. Observers' inability to know actors' desires, whether alternatives were recognized or considered, and the difficulty of ascribing the person from the situation, leads observers to more often attribute premeditation of and control over outcomes to actors than actors attribute to themselves. This is exacerbated by observers' tendency to generalize others' intentions and a failure to discount knowledge gained from hindsight.

**Effects of Premeditation**

The evidence presented suggests that the presence of premeditation does not serve as a reliable index of personal control. If premeditation is present before outcomes that we did not cause and absent before outcomes that we did, it is questionable whether premeditation deserves to be considered an indicator of intentional action. In a broad sense, judgments and decisions are influenced by information that is accessible when they are made (Kahneman & Frederick, 2002; Morewedge, Gilbert, & Wilson, 2005; Morewedge, Hoffman, & Epstein, 2005; Tversky & Kahneman, 1973; Winkielman & Schwarz, 2011), and it would be surprising if information considered during premeditation had no effect on outcomes produced by the premeditated act. Given the normative social judgments that consequences of considering an outcome have to be caused by a premeditated decision (Deonna, 2003; Federal Sentencing Guidelines, 2004; Kadish & Schulhofer, 1995; Weiner, 1995), it is natural to wonder: What are the effects of premeditation on decision making?

It is clear that merely thinking about a desired action makes us more likely to produce, particularly when that action is easy to initiate (Levitt & Lerner, 1985), indeed, we are more likely to perform pro-social actions and less likely to perform antisocial actions if we think about them in advance (Sherman, 1985). Registered voters asked if they intended to vote in an election were 25% more likely to vote than those who were not asked (Greenwald et al., 1987). M.B.A. students who think about fictionalized their teeth more frequently than those led to think the reading for pleasure (Levitt & Lerner, 2006). Perhaps most surprisingly, participants in a nationally representative sample of adult American households were 35% more likely to make a purchase costing thousands of dollars—a car—with 6 months of saving, compared to a few dimensions or features currently.

If we end up over-weighing the few features dimensions we can consider and underrating unconsidered features when making a choice, we may go home early to recover, by deciding beforehand how to respond when a relevant situation presents itself, you can work towards your goals and avoid getting sidetracked by distractions and procrastination (Dellisento & Bourne, 1984). Furthermore, preemptively deciding how to behave may lead to the eventual automation of the intended goal-directed behavior (Bargh, 1997; Gollwitzer, 1995, 1996).

Although premeditation can help us work toward goals by increasing the probability that we will be able to produce, the effects of premeditation are not always beneficial. Wilson and Schooler (1990) found that novice jam-tasters asked to rate jams after introspecting about their opinions were less accurate in their taste ratings than novice jam-tasters in a control condition. Similarly, students who introspected about their artistic preferences before choosing one of two posters to adorn their dorm room were less likely than controls to choose a high-quality art poster rather than a lesser-quality humorous poster (e.g., Starry Night by Van Gogh rather than Garfield by Jim Davis). Furthermore, those introspectors reported feeling less satisfied with their choice 3 weeks later than did controls, suggesting that premeditation can impair the certainty of decisions used to inform judgments and decisions (Wilson et al., 1995).

Dijksterhuis (2004) examined effect of premeditation on the quality of decisions and found its usefulness depends on the complexity of the decision and the kind of deliberation used to make it. He suggests that conscious deliberation improves the quality of simple decisions such as which shampoo or oven to buy, and it is possible to simultaneously compare a few dimensions or features currently.

Dijksterhuis also suggests that conscious deliberation reduces the stability of complex decisions such as whether to marry or house to buy, because we simultaneously compare a large number of dimensions or features currently. If we end up over-weighing the few features dimensions we can consider and underrating unconsidered features when making a choice, we may go home early to recover, by deciding beforehand how to respond when a relevant situation presents itself, you can work towards your goals and avoid getting sidetracked by distractions and procrastination (Dellisento & Bourne, 1984). Furthermore, preemptively deciding how to behave may lead to the eventual automation of the intended goal-directed behavior (Bargh, 1997; Gollwitzer, 1995, 1996).

In sum, the effects of premeditation appear to depend on the decision at hand. Premeditation increases the likelihood that actors will procure the premeditated outcomes and desired goal directed behavior, which can be good or bad if committing one's life to justice vs. commu...
murder. Whether premeditation improves or impairs decisions appears to depend on the alternatives considered. Premeditation appears to improve the quality of decisions involving alternatives that are relatively simple, but sometimes impairs the quality of decisions involving alternatives that are more complex.

Implications for Self-Control

The findings presented in this chapter suggest that premeditation may not reliably indicate when we possess control over a decision or outcome. Disturbingly, these findings not only imply that premeditation may not serve the importance afforded it by society and the law, but also that we should reconsider and carefully examine the extent to which our conscious thoughts actually enable us to exert self-control. If the link between premeditation and control is spurious for unimportant decisions (such as art selection), it is possible that conscious forethought also has little influence on more important decisions, such as those made when we are confronted with the choice to consume or abstain from the consumption of unhealthy foods, alcohol, cigarettes, and drugs.

We may lament "Why didn't I think this through?" after succumbing to temptation, but it may be that even with significant premeditation we would have chosen to find our shirts covered in powdered sugar and dough crumbs, our breath reeking of whisky, the only difference being the greater sense of guilt caused by considering our gluttonous behavior before we engaged in it. Indeed, much of our behavior is affected by unconscious goals and motivations (Diener, Liberman, & Friedman, 2007; Funder, Liberman, & Friedman, 2007). On the other hand, when we are able to resist our impulses and make the appropriate choice, having consciously refrained temptation may make us feel empowered. The experience of conscious conflict may have the additional benefit of making us more satisfied with our choice to behave well (Brehm, 1956; Festinger, 1957). We are not, however, advocating the embrace of the belief that we are all self-indulgent automatons, powerless to avoid our impulses to eat fattening foods and wash them down with stiff drinks, particularly as advancing such a belief may have profound negative consequences (Vois & Schoofer, 2008). Rather, evidence suggests that the conscious struggles we engage in when faced with self-control dilemmas does actually have some influence over our behavior. We appear to have a limited resource of self-control that we can allocate toward specific tasks (Baumeister et al., 1998, 2004; Wegner, 1994). The key puzzle appears to be determining what role conscious thought plays in the theater of self-control. Perhaps conscious thought determines the impuls that we should regulate with this limited resource and the impulses that are not worth attempting to control. We may thus decide to apply our limited resource of self-control to the dilemmas we consider most important, and to prevent the lapses that would reflect not poorly upon ourselves, just as people are able to selectively inhibit the forms of prejudice that are frowned upon by their society (Fiske, 1994; Marks, 1999). Alternatively, conscious thought may allow us to create automatic behavioral scripts—implementation intentions—that are carried out when we must exert self-control (Gollwitzer, 1999). Ironically, then, premeditation may influence decisions indirectly by automatizing the behaviors we consciously tend to produce.

Conclusion

Actors, observers, society, and the law all place faith in premeditation as a principle indicative of personal control. The findings presented in this chapter illustrate many instances in which these faith-based judgments are misplaced. Actors have difficulty discerning the efficaciousness of their premeditation, and rely on the apparatus rather than the actual fulfillment of the foreword we reviewed: (1) Having considered or ability to consider multiple alternatives (2) the mediation they engaged in occurred prior to the action, or outcome produced; (3) if outcomes were consistent with the alternatives considered; (4) if outcomes were exclusively or internally consistent on the part of the act.

Premeditation appears to fulfill these five requirements to determine whether outcomes were caused by an actor's premeditation, and exhibit a general tendency to over-attribute outcomes to actors' premeditated decisions. The cursory examination of alternatives, priorities, consistency, exclusivity, and effort by observers is largely due to their lack of first-hand knowledge, which is often inferred from their own musings, emotions, and beliefs about actors' meta-decisions.

Although premeditation increases the likelihood that we will produce the outcome we intend to perform, its benefits are questionable. Given the serendipitous nature of its social and legal consequences, it may thus be time to reconsider the privileged position of this often inefficient behavior. Premeditation appears to often be a more than natural, incidental cognition that generates false feelings of personal control. In spite of this, there may be hope for self-control if we can premeditate far enough in advance to form automatic action plans. Nevertheless, these findings suggest it may be time to seriously question whether premeditation deserves the importance granted to it by society and the law, and whether it should continue to serve as a primary indicator of personal control.

References


CHAPTER 15

The Power of Planning: Self-Control by Effective Goal-striving

Peter M. Gollwitzer, Caterina Gawrilow, and Gabriele Oettingen

ABSTRACT

As highlighted by Kurt Lewin, goal attainment is not yet secured solely by forming strong contents to highly desirable and feasible goals. There is always the subsequent issue of implementation, and one wonders what people can do to enhance their chances of being successful at this phase of goal pursuit. A promising answer seems to be the following: People may plan in advance how they want to solve the problems of goal implementation. But what are these problems? There are four problems that stand out. These problems include getting started with goal striving, staying on task, calling a halt, and not overextending oneself. We will describe research showing that making these plans (i.e., form implementation intentions) can deal with these problems and can facilitate goal attainment. Throughout, we will ask whether implementation intentions foster goal attainment even in conditions that are commonly viewed as not amenable to self-regulation attempts, such as succeeding on an intelligence test or overcoming spider phobia. Finally, we will report research showing that implementation intentions can even foster goal-achievement in those situations (e.g., children with ADHD) that are known to suffer from impaired action control.

Keywords: Implementation intentions, Goal intentions, Medial/lateral prefrontal cortex, Motivation, Goal-shielding, Disengagement, Overextension, Academic test performance, Nogo performance, Winner determination, Overcoming habitual responses, Simon effect, Spider phobia, Weapon identification task, Behavior change interventions. Children with ADHD. Response inhibition, Delay of gratification, Set-shifting, Multitasking.

Research on self-regulation and self-control has defined its object of interest by emphasizing different phenomena and processes. The many targeted phenomena include overriding unwanted thoughts (e.g., related to distractions, temptations, stereotyping, self-inflation), feelings (e.g., anger, disgust, fear, sadness, prejudice) and behaviors (e.g., aggressive, immoral, risky, health-damaging, underachieving). The various processes that are assumed to pro self-regulation and self-control pertain to the regulated over the unwanted by actively inhibiting the unwanted and/or activating the wanted, or by modifying one's current anticipated emotions so that the unwanted be executed more easily, and the unwantas be more easily halted or prevented. Often assumed that effective self-regulation and