Inducing Alternative-Based and Characteristic-Based Search Procedures in Risky Choice

Supplementary Material

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1 Graphical Illustrations of ABS and CBS Procedures

	Attr.1	**Attr.2**	$\cdots$	**Attr.**m
Alt.1	a_{11}	a_{12}	$\cdots$	a_{1m}
Alt.2	a_{21}	a_{22}	$\cdots$	a_{2m}
$\cdots$	$\cdots$	$\cdots$	$\cdots$	$\cdots$
Alt.n	a_{n1}	a_{n2}	$\cdots$	a_{nm}

Table S1: An ABS procedure in an n-alternative choice problem, where each alternative is made of m attributes

	Attr.1	**Attr.2**	$\cdots$	**Attr.**m
Alt.1	a_{11}	a_{12}	$\cdots$	a_{1m}
Alt.2	a_{21}	a_{22}	$\cdots$	a_{2m}
$\cdots$	$\cdots$	$\cdots$	$\cdots$	$\cdots$
Alt.n	a_{n1}	a_{n2}	$\cdots$	a_{nm}

Table S2: A CBS procedure in an n-alternative choice problem, where each alternative is made of m attributes

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2 Bomb Risk Elicitation Task

The literature has offered multiple methods for eliciting risk preferences (Harrison and Rutström, 2008). In this experiment we use 'Bomb Risk Elicitation Task' (BRET) proposed by Crosetto and Filippin (2013). According to BRET, each subject is faced with a minefield made of n boxes. Subjects are told that $n-1$ boxes are empty and 1 box contains a time bomb programmed to explode at the end of the task. Subjects are also told that the location of the bomb in the minefield is randomly determined. Subjects have to decide how many boxes k to uncover, where $k \in \{0, 1, \ldots, n\}$. Each subject earns €$(a \times k)$ if the bomb is not located underneath any of the uncovered boxes and zero, otherwise (the bomb exploding wipes out all the earnings), where $a > 0$ is a parameter. If a subject decides to collect k boxes, then the lottery induced by this decision is formally expressed in equation 1.

$$\frac{n-k}{n} \circ (a \times k) \oplus \frac{k}{n} \circ 0 \tag{1}$$

It is a simple implication of equation 1 that the higher (resp., lower) the number of uncovered boxes, the higher (resp., lower) the reward in case the bomb is not collected and, at the same time, the higher (resp., lower) the chances that the bomb is collected. It is easy to verify that if a subject is neutral to risk, then she chooses to collect $k = \frac{n}{2}$ boxes (to maximise expected value); if a subject is risk-averse, then she chooses $k < \frac{n}{2}$; if a subject is risk-lover, then she chooses $k > \frac{n}{2}$. In the experiment we set $n = 100$ and a equal to 3 euro cents. As a result, the threshold $\frac{n}{2}$ is equal to 50 and subjects could earn any multiple of 3 euro cents between a minimum of €0 and a maximum of €2.97.

3 Examples of Screenshots in Task 2

Remark 1 (CBS Treatment)**.** *The purpose of this remark is to further clarify how the CBS treatment is designed. Just like in the other two treatments, in the CBS treatment every choice problem is presented in* ***one*** *screenshot, and there is no pre-selection stage. In particular, within the very same screenshot subjects can explore any prize-probability pair by clicking on the prize-probability pair they want to explore. Figure S2 displays an example of a screenshot in the CBS treatment, in which an hypothetical experimental subject explores the second-prize probability pair. If the hypothetical subject intends to then explore the - say - first-prize probability pair, then within the same screenshot they would simply have to click on the first prize-probability pair of* ***any*** *lottery available at the choice problem of figure S2, and the software would hide the information about the second prize-probability pair and show the information about first-prize probability pair. Every string 'vinci probabilitá' of figure S2* ***is itself a button****, behind which information is hidden, and subjects can explore the piece of information they are interested in by simply clicking on it. As discussed in the main body of the paper, the novelty of our design as far as the CBS treatment is concerned lies in the fact that, unlike in the traditional mouse-tracing method, by clicking the tth prize-probability pair of a lottery available at some choice problem, the software displays the tth prize-probability pair of* ***all*** *lotteries available at that particular choice problem.*

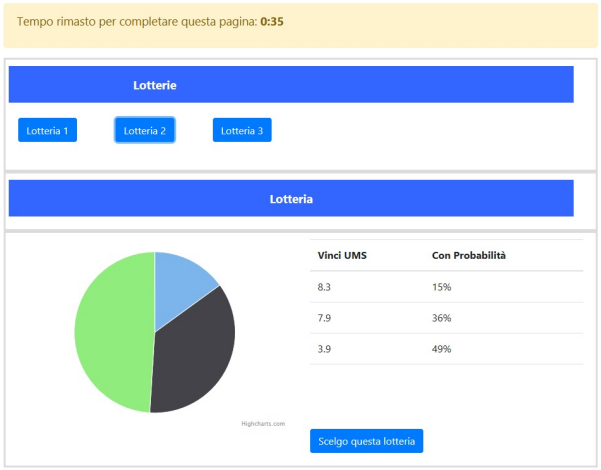

Figure S1: A Screenshot in the ABS Treatment

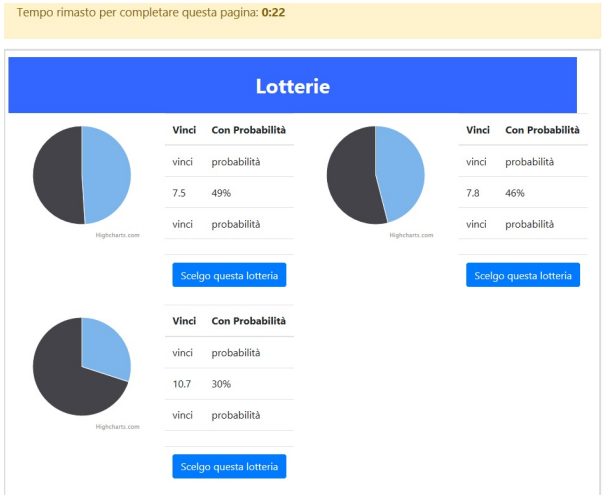

Figure S2: A Screenshot in the CBS Treatment

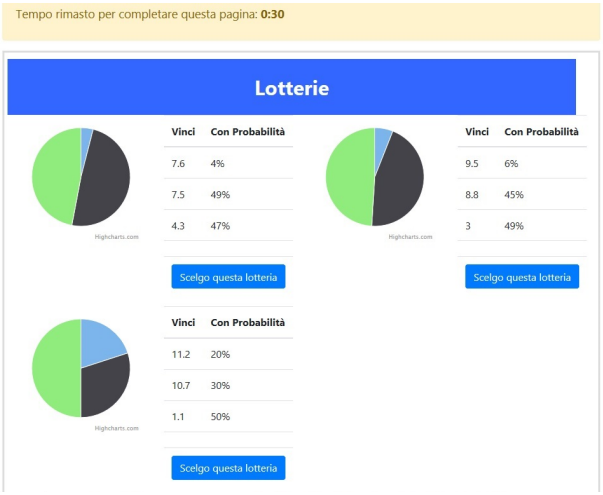

Figure S3: A Screenshot in the Baseline Treatment

4 Lottery Database

	Prob 1	Prize 1	Prob2	Prize 2
L_1	40.00%	6.3	60.00%	5.8
L_2	60.00%	6.4	40.00%	5.4
L_3	60.00%	6.6	40.00%	5.1
L_4	55.00%	6.9	45.00%	4.9
L_5	52.00%	7.2	48.00%	4.7
L_6	40.00%	8.1	60.00%	4.6
L_7	45.00%	8.2	55.00%	4.2
L_8	40.00%	8.4	60.00%	4.4
L_9	42.00%	8.9	58.00%	3.9
L_{10}	40.00%	9.3	60.00%	3.8
L_{11}	50.00%	9.5	50.00%	2.5
L_{12}	52.00%	9.6	48.00%	2.1
L_{13}	52.50%	9.8	47.50%	1.8
L_{14}	50.00%	10.3	50.00%	1.7
L_{15}	50.00%	10.4	50.00%	1.6
L_{16}	51.00%	10.9	49.00%	0.9
L_{17}	50.00%	11.9	50.00%	0.1
L_{18}	50.00%	12	50.00%	0

Table S3: Lotteries with Two Prizes (in €)

	Prob 1	Prize 1	Prob2	Prize 2	Prob 3	Prize 3
L_1	31.00%	6.3	36.00%	6.2	33.00%	5.5
L_2	15.00%	6.8	50.00%	6.6	35.00%	4.8
L_3	50.00%	6.9	10.00%	6.7	40.00%	4.7
L_4	8.00%	7.1	50.00%	7	42.00%	4.6
L_5	42.00%	7.3	12.00%	7.2	46.00%	4.5
L_6	4.00%	7.6	49.00%	7.5	47.00%	4.3
L_7	32.00%	7.7	20.00%	7.6	48.00%	4.2
L_8	25.00%	8.1	25.00%	7.7	50.00%	4.1
L_9	6.00%	8.2	46.00%	7.8	48.00%	4
L_{10}	15.00%	8.3	36.00%	7.9	49.00%	3.9
L_{11}	22.00%	8.6	26.00%	8.4	52.00%	3.7
L_{12}	26.00%	9	22.00%	8.6	52.00%	3.4
L_{13}	6.00%	9.5	45.00%	8.8	49.00%	3
L_{14}	4.00%	10	47.00%	9.1	49.00%	2.7
L_{15}	5.00%	10.4	45.00%	9.4	50.00%	2.5
L_{16}	40.00%	10.7	8.00%	9.8	52.00%	1.8
L_{17}	20.00%	11.2	30.00%	10.7	50.00%	1.1
L_{18}	12.00%	11.8	40.00%	11.1	48.00%	0.3

Table S4: Lotteries with Three Prizes (in €)

	Prob 1	Prize 1	Prob2	Prize 2	Prob 3	Prize 3	Prob 4	Prize 4
L_1	25.00%	6.2	25.00%	6.1	25.00%	5.9	25.00%	5.8
L_2	18.00%	6.4	31.00%	6.2	19.00%	5.8	32.00%	5.7
L_3	21.00%	6.6	28.00%	6.3	32.00%	5.7	19.00%	5.4
L_4	32.00%	6.7	12.00%	6.5	54.00%	5.5	2.00%	5.3
L_5	10.00%	6.8	44.00%	6.6	12.00%	5.4	34.00%	5.2
L_6	35.00%	7.2	14.00%	6.7	43.00%	5	8.00%	4.9
L_7	8.00%	7.7	48.00%	7	11.00%	4.9	33.00%	4.5
L_8	12.00%	8.2	36.00%	7.5	7.00%	4.8	45.00%	4.4
L_9	38.00%	8.9	1.00%	7.7	10.00%	4.5	51.00%	4.1
L_{10}	18.00%	9.3	29.00%	7.9	21.00%	3.9	32.00%	3.8
L_{11}	16.00%	9.6	30.00%	8.4	45.00%	3.7	9.00%	3.1
L_{12}	17.00%	10.2	31.00%	8.8	15.00%	3.1	37.00%	2.9
L_{13}	5.00%	10.6	44.00%	9.2	24.00%	3	27.00%	2.6
L_{14}	20.00%	10.8	28.00%	9.5	6.00%	2.8	46.00%	2.2
L_{15}	32.00%	11.1	12.00%	10.8	36.00%	2.2	20.00%	1.8
L_{16}	11.00%	11.5	34.00%	11	20.00%	2	35.00%	1.7
L_{17}	34.00%	11.9	14.00%	11.1	14.00%	1.5	38.00%	0.5
L_{18}	50.00%	12	0.00%	0	0.00%	0	0.00%	0

Table S5: Lotteries with Four Prizes (in €)

5 Instructions (English)

Instructions are translated from Italian. Treatment-specific instructions are in italic.

5.1 Task 1

Welcome to the experiment! You have already earned €3 for showing up on time.

In this experiment, you will have to perform several tasks that will be explained in detail later on. Depending on the quality of your choices in the different tasks you will have the opportunity to earn additional money. The amount you earn in the various tasks will be announced at the end of the experiment.

In the first task you will be shown a minefield consisting of 100 boxes. Under 99 boxes there is nothing, while under one box is hiding a time bomb. The location of the bomb in the minefield is randomly determined. Not knowing where the bomb is, your task is to decide how many boxes (between 0 and 100) you want to collect. If among the boxes you decide to collect does not hide the bomb, then you will earn 3 euro cents for each box you have decided to collect. If on the contrary, among the boxes you collect is hiding the bomb, then you will not earn anything, the time bomb - in exploding - wipes out all your earnings. Therefore, the greater the number of boxes you collect, the greater your potential earnings, but, at the same time, the greater the chances that you collect the bomb. On the contrary, the smaller the number of boxes you collect, the smaller your potential earnings, but, at the same time, the lower the chances that you collect the bomb.

If you have questions please raise your hand and wait silently for the experimentalist.

As soon as you are ready, click 'Next'.

5.2 Snake-Like Game

The next task is to play a Snake-like game. Snake is a serpent that, eating everything it encounters, gets bigger and bigger. Each object it eats makes you earn points. Your goal is to pilot the snake by using the arrow keys on the keyboard (up, down, left and right) with the objective of making it eating as many objects as possible. For each object the snake eats, you earn 1 euro cent. If the snake crashes on the walls, a match ends. If this happens you have to click on the 'Start' button to start playing again.

At the top of the screen, a timer will show you at every point in time how much time is left to play.

If you have questions please raise your hand and wait silently for the experimentalist.

As soon as you are ready, click 'Next'.

5.3 Task 2

The next task consists of a series of choice problems. Each choice problem is made of a bunch of lotteries. A lottery consists of a series of prizes (sums of money in Euros) and corresponding probabilities (expressed as a percentage). Each prize is matched to the probability of obtaining it (i.e., the probability of winning the prize itself). For example, if a lottery wins 5 Euros with a probability of 70% and 7.20 Euros with a probability of 30%, this means that if this lottery were played, in 7 cases out of 10, it would win 5 Euros and in 3 out of 10 would win 7.20 Euros.

[**ABS** *At every choice problem, at the top of the screen the list of lotteries available will appear (for example, 'lottery 1', 'lottery 2', etc.). To discover the prizes and the corresponding probabilities of a lottery, you will need to click on the lottery that you want to explore and at the bottom of the screen you will be shown the prizes and the corresponding probability of the selected lottery. Next to each lottery you will also be shown a pie chart, whose slices graphically represent the probabilities of the different prizes. You can explore the lotteries as you like, even by discovering the same lottery more than once. Your goal is to choose the lottery you prefer the most among those available, by clicking on the 'choose this product' button when you are sure of your choice.*]

[**CBS** *At every choice problem, the prizes and the corresponding probabilities of the lotteries available will not be immediately visible. To explore a certain prize and its corresponding probability, you will have to click on the prize or the corresponding probability you want to examine and you will be shown that prize and the corresponding probabilities for each lottery available in that given choice problem. Next to each lottery you will be shown a pie chart, whose highlighted slice graphically represents the probability of obtaining the prize you have discovered. The prizes (with the corresponding probabilities) of each lottery will be arranged in descending order from the top to the bottom (within each lottery the first prize at the top will be the largest of that lottery, the second prize from the top will be the second largest of that lottery and so on). You can explore the prizes and the probabilities of the lotteries available in the way you prefer, even by discovering the same prizes and the corresponding probabilities more than once. Your goal is to choose the lottery you prefer the most among those available by clicking on the 'choose this product' button when you are sure of your choice.*]

[**Baseline** *At every choice problem, you will be shown the available prizes and the corresponding probabilities for each lottery. Next to each lottery you will be shown a pie chart, whose slices graphically represent the probabilities of the various prizes. Your goal is to choose the lottery you prefer the most among those available by clicking on the 'choose this product' button.*]

In this task you will be required to solve multiple choice problems, in which the number of lotteries, as well as the number of prizes and corresponding lottery probabilities will vary. At the top of the screen, a timer will inform you at every point in time how much time is left to make a decision at each choice problem. To calculate

your earnings of this task, we will randomly select a choice problem at the end of the experiment and consider the lottery you chose from the selected problem. The selected lottery will be 'played' and the outcome of this lottery will automatically be determined by the experimental software according to the characteristics of the lottery you chose, and you will be paid accordingly. If you do not choose any lottery at a choice problem, your earnings will automatically be zero for that particular choice problem.

If you have questions please raise your hand and wait silently for the experimentalist.

As soon as you are ready, click 'Next'.

5.4 CRT

The next task consists of answering three numerical questions. Enter the (numeric) answer you think is correct in the appropriate box. For every exact answer, you will earn 30 Euro cents.

At the top of the screen, a timer will inform you at every point in time how much time is left to answer to the three questions.

If you have questions please raise your hand and wait silently for the experimentalist.

As soon as you are ready, click 'Next'.

6 Instructions (Italian)

6.1 Task 1

Benvenuta/o all'esperimento.

Hai giá guadagnato 3 euro per esserti presentata/o in orario.

In questo esperimento dovrai eseguire 4 compiti che ti spiegheremo dettagliatamente in seguito. In base alla qualità delle tue scelte nei diversi compiti potrai guadagnare un'altra somma di denaro. L'ammontare che guadagnerai nei diversi compiti ti sarà comunicato alla fine dell'esperimento.

Nel primo compito ti sarà mostrato un campo minato composto da 100 caselle. Sotto 99 di queste 100 caselle non si nasconde nulla mentre sotto 1 casella si nasconde una bomba a tempo. La casella che nasconde la bomba è stata scelta in maniera casuale. Non sapendo dove si trova la bomba, il tuo compito consiste nel decidere quante caselle (tra 0 e 100) vuoi scoprire. Se tra le caselle che hai deciso di scoprire NON si nasconde la bomba, allora guadagnerai 3 centesimi di euro per ogni casella che hai deciso di scoprire. Se, invece, tra le caselle che hai deciso di scoprire si nasconde la bomba, allora non guadagnerai nulla, perché la bomba a tempo - esplodendo - distrugge tutti i tuoi guadagni. Quindi quanto maggiore è il numero di caselle che decidi di scoprire, tanto maggiore, da un lato, sarà il tuo guadagno potenziale e tanto maggiori, dall'altro lato, saranno le possibilità che tra le caselle che decidi di scoprire si trovi la bomba (e che quindi i tuoi guadagni siano persi). Quanto minore è il numero di caselle che decidi di scoprire tanto minore, da un lato, sarà il tuo guadagno potenziale e tanto minori, dall'altro lato, saranno le possibilità che tra le caselle che decidi di scoprire si trovi la bomba (e che quindi i tuoi guadagni non siano persi).

Se hai domande da fare alza la mano e attendi in silenzio la risposta dello staff di laboratorio.

Non appena sei pronta/o clicca 'successivo'.

6.2 Snake-Like Game

Il secondo compito consiste nel giocare al videogioco 'Snake'. Snake è un serpente, che mangiando tutto quello che incontra, si allunga facendo guadagnare al giocatore dei punti. Il tuo obiettivo consiste nel pilotare il serpente usando i tasti freccia della tastiera (su, giú, sinistra e destra) facendo in modo che il serpente mangi piú oggetti possibili. Per ogni oggetto che il serpente mangia, guadagni 1 centesimo di euro. Se il serpente si schianta sulle pareti, una partita finisce. Qualora questo accadesse dovrai cliccare su 'Start' per ricominciare a giocare.

Nella parte alta dello schermo un timer ti informerá istante per istante quanto tempo ti rimane per giocare a snake.

Se hai domande da fare alza la mano e attendi in silenzio la risposta dello staff di laboratorio.

Non appena sei pronta/o clicca 'successivo'.

6.3 Task 2

Il terzo compito consiste in una serie di problemi di scelta. Ogni problema di scelta è costituito da un insieme di alcune lotterie. Ogni lotteria è composta da una serie di premi (somme di denaro in euro) e corrispondenti probabilitá (espresse in percentuale). Ogni premio è quindi abbinato alla probabilitá di ottenerlo (cioè alla probabilitá di conseguire la vincita del premio stesso). Per esempio, se una lotteria fa vincere 5 euro con probabilitá 70% e 7,20 euro con probabilitá 30%, questo significa che, se questa lotteria fosse giocata, in 7 casi su 10 si vincerebbero 5 euro e in 3 casi su 10 si vincerebbero 7,20 euro.

[**ABS** *In ogni problema di scelta nella parte alta dello schermo saranno elencate le lotterie disponibili (ad esempio, 'lotteria 1', 'lotteria 2', eccetera). Per scoprire i premi e le corrispondenti probabilitá di una lotteria, dovrai cliccare sopra la lotteria che intendi vedere e, nella parte bassa dello schermo, ti saranno mostrati i premi e le corrispondenti probabilitá della lotteria da te selezionata. A fianco di ogni lotteria ti sarà mostrato un diagramma 'a torta' le cui fette corrispondono alle probabilitá dei diversi premi. Potrai esplorare le lotterie nel modo che preferisci, anche scoprendo ripetutamente la stessa lotteria; ossia aprendo piú volte, anche in diversi momenti della sessione sperimentale, le finestre che nascondono le lotterie. Il tuo obiettivo è di scegliere la lotteria che preferisci tra quelle disponibili, cliccando, quando sarai sicura/o della tua scelta, sull'apposito tasto 'scelgo questo prodotto'.*]

[**CBS** *In ogni problema di scelta i premi e le corrispondenti probabilitá delle lotterie disponibili non saranno immediatamente visibili. Per scoprire un certo premio e la sua corrispondente probabilitá, dovrai cliccare sopra il premio o sulla corrispondente probabilitá che intendi esaminare e ti saranno mostrati il premio e la corrispondente probabilitá di ogni lotteria disponibile in quel dato problema di scelta. A fianco di ogni lotteria ti sarà mostrato un diagramma 'a torta' le cui fetta evidenziata corrisponde alle probabilitá di ottenimento del premio che hai scoperto. I premi (con le rispettive probabilitá) di ogni lotteria saranno ordinati in maniera decrescente dall'alto verso il basso (in ogni lotteria il primo premio dall'alto verso il basso sarà il piú grande di quella lotteria, il secondo premio dall'alto verso il basso sarà il secondo piú grande di quella lotteria e così via). Potrai esplorare i premi e le corrispondenti probabilitá delle lotterie disponibili nel modo che preferisci, anche scoprendo piú volte gli stessi premi e le corrispondenti probabilitá. Il tuo obiettivo è di scegliere la lotteria che preferisci tra quelle disponibili cliccando, quando sarai sicura/o della tua scelta, sull'apposito tasto 'scelgo questo prodotto'.*]

[**Baseline** *In ogni problema di scelta ti saranno mostrati per ogni lotteria disponibile i premi e le corrispondenti probabilitá. A fianco di ogni lotteria ti sarà mostrata un diagramma 'a torta' le cui fette corrispondono alle probabilitá dei diversi premi. Il tuo obiettivo è di scegliere la lotteria che preferisci tra quelle disponibili cliccando*

sull'apposito tasto 'scelgo questo prodotto'.]

In questo terzo compito ti sarà richiesto di risolvere molteplici problemi di scelta, nei quali il numero di lotterie così come il numero di premi e corrispondenti probabilitá per lotteria varieranno. Nella parte alta dello schermo un timer ti informerà istante per istante quanto tempo ti rimane per prendere una decisione in ogni problema di scelta. Per calcolare il tuo guadagno di questo compito estrarremo a caso un problema di scelta alla fine dell'esperimento e la lotteria da te scelta nel problema estratto sarà giocata. L'esito di tale lotteria sarà determinato automaticamente dal software sperimentale, ovviamente in base alle caratteristiche della lotteria scelta, e costituirà il tuo guadagno per quel che riguarda questo terzo compito. Se non scegli nessuna lotteria in un problema di scelta, il tuo guadagno sarà automaticamente azzerato per quel che riguarda quel dato problema di scelta.

Se hai domande da fare alza la mano e attendi in silenzio la risposta dello staff di laboratorio.

Non appena sei pronta/o clicca 'successivo'.

6.4 CRT

Il quarto compito consiste nel rispondere a tre quesiti di tipo numerico. Inserisci la risposta (numerica) che ritieni corretta nell'apposita casella. Per ogni risposta esatta guadagnerai 30 centesimi di euro.

Nella parte alta dello schermo un timer ti informerà istante per istante quanto tempo ti rimane per rispondere ai 3 quesiti.

Se hai domande da fare alza la mano e attendi in silenzio la risposta dello staff di laboratorio.

Non appena sei pronta/o clicca 'successivo'.

7 Task 2 - Statistical Tests

Remark 2 (Bootstrap Procedure)**.** *The procedure we used to conduct the bootstrap analysis of independent samples t-test can be summarised as follows. First, we run a two-tailed t-test for independent samples to test for the equality of means and obtained a t statistic. Second, in order to ensure that the null hypothesis of equality of means holds in the bootstrap analysis, we applied a transformation to our data. Specifically, for each pair of independent samples being compared, we transformed each original pair of samples into a new pair of samples that have equal means and are otherwise identical to the original samples. Third, we drew at random 1,000 samples (of the same size as the original samples, with replacement) from each transformed sample and, for each pair of randomly generated independent samples, we calculated a $\tilde{t}$ statistic. Fourth, from the resulting distribution of $\tilde{t}$ statistics, we estimated the p-value (labelled 'Estim.P-Value' in the tables below) by counting the number of times the value of $\tilde{t}$ is more extreme than that of t and dividing by 1,000.*

	Mann-Whitney		Bootstrap(1,000 samples)
Comparison	St.Test Stat.	Asympt.Sig.	Estim.P-Value
ABS vs CBS	6.362	0.000***	0.000***
ABS vs Base	1.426	0.154	0.179
Base vs CBS	5.246	0.000***	0.000***

Table S6: Difference in Average CRI - ABS(n=76), CBS(n=72), Baseline(n=78)

	Mann-Whitney		Bootstrap(1,000 samples)
Comparison	St.Test Stat.	Asympt.Sig.	Estim.P-Value
ABS vs CBS	5.160	0.000***	0.000***
ABS vs Base	0.630	0.528	0.769
Base vs CBS	4.937	0.000***	0.000***

Table S7: Difference in Average CRI (Risk-Averse Subjects) - ABS(n=47), CBS(n=44), Baseline(n=46)

	Mann-Whitney		Bootstrap(1,000 samples)
Comparison	St.Test Stat.	Asympt.Sig.	Estim.P-Value
ABS vs CBS	2.736	0.006***	0.013**
ABS vs Base	-0.302	0.763	0.801
Base vs CBS	2.696	0.007***	0.005***

Table S8: Difference in Average CRI (Risk-Lover Subjects) - ABS(n=21), CBS(n=19), Baseline(n=21)

Complexity		Mann-Whitney		Bootstrap(1,000 samples)
#Attr.	#Alt.	St.Test Stat.	Asympt.Sig.	Estim.P-Value
2	2	5.349	0.000***	0.000***
2	3	4.697	0.000***	0.000***
2	4	1.469	0.142	0.081*
3	2	1.077	0.282	0.272
3	3	3.175	0.002***	0.002***
3	4	1.267	0.205	0.137
4	2	4.437	0.000***	0.000***
4	3	4.094	0.000***	0.001***
4	4	3.305	0.000***	0.003***

Table S9: Difference in Average CRI by Complexity - ABS($n = 76$) vs CBS($n = 72$)

8 Information Search - Statistical Tests

Treatment	% of Information Looked Up		
	0%	50%	100%
ABS	100.00	100.00	99.34
CBS	100.00	100.00	84.72

Table S10: Cumulative Percentage of Problems at Which Subjects Looked up At Least 0%, 50%, or 100% of the Available Information - Two-Lottery Problems for the ABS Treatment(n=76) and Two-Prize/Prob.Pair Problems for the CBS Treatment(n=72)

Treatment	% of Information Looked Up			
	0%	33%	66%	100%
ABS	100.00	100.00	99.55	98.22
CBS	100.00	100.00	90.97	85.65

Table S11: Cumulative Percentage of Problems at Which Subjects Looked Up At Least 0%, 33%, 66%, or 100% of the Available Information - Three-Lottery Problems for the ABS Treatment(n=76) and Three-Prize/Prob.Pair Problems for the CBS Treatment(n=72)

Treatment	% of Information Looked Up				
	0%	25%	50%	75%	100%
ABS	100.00	100.00	98.90	97.70	93.40
CBS	100.00	100.00	91.20	87.96	84.72

Table S12: Cumulative Percentage of Problems at Which Subjects Looked Up At Least 0%, 25%, 50%, 75%, or 100% of the Available Information - Four-Lottery Problems for the ABS Treatment(n=76) and Four-Prize/Prob.Pair Problems for the CBS Treatment(n=72)

Complexity		Mann-Whitney	
#Attr.	#Alt.	St.Test Stat.	Asympt.Sig.
2	2	3.524	0.000***
2	3	2.989	0.002***
2	4	3.666	0.000***
3	2	2.613	0.009***
3	3	3.360	0.000***
3	4	2.308	0.0210**
4	2	4.018	0.000***
4	3	4.143	0.000***
4	4	1.834	0.067*

Table S13: Difference in the average number of times subjects looked up all information available - ABS($n = 76$) vs CBS($n = 72$)

Complexity		Mann-Whitney	
#Attr.	#Alt.	St.Test Stat.	Asympt.Sig.
2	2	2.354	0.019**
2	3	1.594	0.111
2	4	2.419	0.016**
3	2	1.273	0.203
3	3	2.354	0.019**
3	4	0.889	0.374
4	2	2.820	0.005***
4	3	2.562	0.011**
4	4	1.442	0.149

Table S14: Difference in the average number of times (risk-averse) subjects looked up all information available - ABS($n = 47$) vs CBS($n = 44$)

Complexity		Mann-Whitney	
#Attr.	#Alt.	St.Test Stat.	Asympt.Sig.
2	2	2.453	0.014**
2	3	2.992	0.003***
2	4	2.741	0.006***
3	2	2.253	0.024**
3	3	2.110	0.037**
3	4	2.416	0.016**
4	2	2.453	0.014**
4	3	2.990	0.003**
4	4	1.421	0.155

Table S15: Difference in the average number of times (risk-lover) subjects looked up all information available - ABS($n = 21$) vs CBS($n = 19$)

Complexity		Pearson's Chi-Square		
#Attr.	#Alt.	T.Stat.	df	P-Value
2	2	0.051	1	0.822
2	3	8.518	2	0.014**
2	4	11.590	3	0.009***
3	2	0.027	1	0.870
3	3	4.464	2	0.107
3	4	5.886	3	0.117
4	2	0.167	1	0.683
4	3	6.384	2	0.041**
4	4	11.528	3	0.009***

Table S16: Goodness-of-Fit Test (H_0: The Total Numbers of Lookups are Uniformly Distributed Across Lotteries) - ABS($n = 76$)

Complexity		Pearson's Chi-Square		
#Attr.	#Alt.	T.Stat.	df	P-Value
2	2	7.227	1	0.0007***
2	3	4.435	1	0.035**
2	4	4.356	1	0.037**
3	2	16.263	2	0.000***
3	3	21.001	2	0.000***
3	4	17.812	2	0.000***
4	2	13.461	3	0.004***
4	3	20.421	3	0.000***
4	4	18.518	3	0.000***

Table S17: Goodness-of-Fit Test (H_0: The Total Numbers of Lookups are Uniformly Distributed Across Prize-Probability Pairs) - CBS($n = 72$)

9 Robustness Checks

		Gend.(F=1)	**Age**	**CRT**	**BRET**
Gend.(F=1)	Spearman Corr.	1	−0.008	−0.316	−0.123
	Sig.(2-tailed)	-	0.905	0.000 ∗ ∗∗	0.065∗
	N	226	226	226	226
Age	Spearman Corr.	−0.008	1	−0.098	0.041
	Sig.(2-tailed)	0.905	-	0.143	0.538
	N	226	226	226	226
CRT	Spearman Corr.	−0.316	−0.098	1	0.133
	Sig.(2-tailed)	0.000 ∗ ∗∗	0.143	-	0.045 ∗ ∗
	N	226	226	226	226
BRET	Spearman Corr.	−0.123	0.041	0.133	1
	Sig.(2-tailed)	0.065∗	0.538	0.045 ∗ ∗	-
	N	226	226	226	226

Table S18: Spearman correlations between gender, age, CRT score and BRET(n = 226)

	Mann-Whitney		Bootstrap(1,000 samples)
Comparison	St.Test Stat.	Asympt.Sig.	Estim.P-Value
ABS vs CBS	4.599	0.000***	0.000***
ABS vs Base	1.818	0.069*	0.047**
Base vs CBS	2.846	0.004***	0.004***

Table S19: Difference in Average CRI (Female Subjects) - ABS(n=41), CBS(n=37), Baseline(n=32)

	Mann-Whitney		Bootstrap(1,000 samples)
Comparison	St.Test Stat.	Asympt.Sig.	Estim.P-Value
ABS vs CBS	4.277	0.000***	0.000***
ABS vs Base	0.152	0.878	0.985
Base vs CBS	4.529	0.000***	0.000***

Table S20: Difference in Average CRI (Male Subjects) - ABS(n=35), CBS(n=35), Baseline(n=46)

References

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