A satiating message influences appetite but not food intake in high disinhibited low restraint women
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INTRODUCTION:
The launch of food products with a satiety message has been increasing in the last few years. The relationship between food behaviour and perceived label is often unclear as it could vary according to individual differences. Factors other than nutritional messages may influence subsequent satiety, like cognitive restraint and disinhibition scores. Conflicting results were obtained concerning a potential cognitive label effect on satiety. Indeed, it seems to also depend on subjects’ food behaviour state.

OBJECTIVES:
The aim of our work was to evaluate the psychological influence on satiety of a message delivered before eating and to analyze whether this result will vary according to disinhibition and restraint scores.

METHOD/ DESIGN:
In a crossover randomized design, 81 lean women attended the laboratory on 2 occasions to test the same control biscuit as a fixed breakfast with either a satiating or a control message. Five groups of subjects were recruited according to their combined restraint and disinhibition scores, including high restraint high disinhibited (HRHD), low restraint low disinhibited (LRLD), high restraint low disinhibited (HRLD), low restraint high disinhibited (LRHD) and a median group, respectively.

RESULTS:
There was no significant effect of the satiating message on food intake at the next ad libitum meal served 3h after breakfast. However concerning appetite sensations, LRHD group had lower appetite, hunger, prospective consumption and desire to consume with the satiating message, mainly between 2 and 3 h after breakfast. Independently of the message, prospective consumption and desire to eat were higher for HD vs. LD volunteers.

CONCLUSION:
These results showed a message effect on appetite feelings for LRHD women who might be the more responsive to environmental cues. Furthermore, the higher prospective consumption observed in high disinhibited volunteers confirmed the importance of considering the level of disinhibition in studies on appetite sensations, especially in free living conditions.

Keywords : satiety, message, disinhibition, restraint, appetite