Myers-Briggs Type Indicator and Conflict-Handling Intention: An Interactive Approach

Terrance Q. Percival
University of Prince Edward Island

Verner Smitheram
University of Prince Edward Island

Margaret Kelly
Prince Edward Island Dept. of Education

When it comes to conflict,
Ts are likelier than Fs to compete or compromise;
Fs are likelier than Ts to collaborate or accommodate; and
Is are likelier than Es to avoid dealing with it in the first place.

Abstract

To investigate how the scales of the MBTI combine interactively to predict strategic intentions for handling interpersonal conflict, the MBTI and the Thomas-Kilmann Conflict Mode Instrument (MODE) were administered to heterogeneous samples of 160 and 180 adults. Using the separate MBTI scales to predict the conflict mode, Is were more likely than Es to avoid conflict, and Fs were more likely than Ts to accommodate, but there were no separate scale effects for competition, collaboration, or compromise replicated across both samples, and no significant results for the S-N or J-P scales. In contrast, using the interactive combinations of scales produced a replicable, consistent, and interpretable pattern of results. The exception was the S-N scale, which did not interact significantly. The most preferred conflict-handling intentions for combinations of the remaining scales were: ETJs preferred competing; EFJs preferred collaborating; ETPs preferred compromising; EFPs preferred accommodating; and all introverted combinations preferred avoiding, except ITPs who preferred compromising. In addition, an interpretable ordered hierarchy from most preferred to least preferred conflict-handling intention was obtained for each of the MBTI groups.

The objective of this study was to extend knowledge about the relationship between personality as measured by the Myers-Briggs Type Indicator (MBTI) and a person's preferred strategy for handling conflict. Because conflict is a pervasive aspect of life, it is important to understand how it can be handled. Although conflict is equally open to positive or negative consequences (Coser, 1956), it is usually experienced as a threat and commonly mishandled, to the detriment of personal relations and effective decisions in family life, education, business, and many organizational settings (Thomas, 1982).

Conflict management efforts intended to increase the possibilities for positive outcomes to conflict in terms of both issue resolution and interpersonal harmony would be improved by insight into the preferred strategies of different types of persons in conflict situations. In particular, the dynamic approach taken here, which accounts for interactive combinations of MBTI scales to predict conflict handling intentions, would enrich our understanding of both the psychological types and modes of conflict resolution and would have practical applications for conflict management in any situation.

In this paper, the theoretical approach is dynamic and interactive: We conceptualize (a) a set of structures and dynamic processes *within* a person, as described by the theory underlying the MBTI, in relation to (b) a set of structures and dynamic processes *between* persons in a conflict context involving a relation of opposition between at least two parties.

In the conflict literature, there is general agreement that both personality and situational variables significantly influence the approaches people use to

handle conflict. Thomas (1988) has proposed a systems approach to conflict management, which takes into account both process and structure--that is, the process of conflict resolution and the structure of the relatively stable characteristics of the persons-in-conflict and the situational context.

According to Thomas (1988), the process of conflict resolution includes each party's selection of a set of strategic intentions to be used in the ensuing negotiation. The options have been formalized in the Thomas-Kilmann Conflict Mode Instrument (MODE) (Kilmann & Thomas, 1977), which measures a person's relative preference for five modes of handling conflict. The MODE (Management of Differences Exercise) instrument is based on a dual concern model of conflict. The two basic dimensions are: (1) assertiveness, the extent to which an individual attempts to satisfy his or her own concerns; and (2) cooperativeness, the extent to which the individual attempts to satisfy the other person's concerns. The interplay of these two dimensions yields the five conflict-handling modes:

(a) *Competing* is assertive and uncooperative--an individual pursues his or her own concerns at the expense of others. Message: "It has to be my way."

(b) *Accommodating* is unassertive and cooperative, the opposite of competing. Message: "If that is what you want, I will agree."

(c) *Avoiding* is unassertive and uncooperative-- the individual does not immediately pursue his or her own concerns or those of the other person. Message: "I don't want to deal with this."

(d) *Collaborating* is both assertive and cooperative, the opposite of avoiding. Message: "Let's see if we can find a solution that satisfies all parties."

(e) *Compromising* is intermediate in both assertiveness and cooperativeness. Message: "Let's split the difference somehow."

Because the actual mode used may vary as a function of situational factors, Thomas (1988) believed that the stable personality characteristic measured by the MODE instrument is not a behavioral trait, but an ordering of *strategic intentions*.

From this point of view, the most promising stable characteristics of persons to study are those that enable the prediction of strategic intentions for conflict resolution. The Jungian theory of psychological type, as measured by the MBTI, has proven to be useful, both theoretically and empirically, for this purpose (Myers & McCaulley, 1985).

Three studies (Chanin & Schneer, 1984; Kilmann

& Thomas, 1975; Mills, Robey, & Smith, 1985) have correlated the four scales of the MBTI with the scales of the MODE instrument. The following summary of results for each MBTI scale reports only results replicated across at least two studies.

(1) *Thinking-Feeling.* All three studies found that Ts were more likely to be competitive and that Fs were more likely to be accommodative. Fs were also more inclined to be cooperative as measured by a combined accommodative-collaborative versus competitive-avoiding scale.

(2) *Extraversion-Introversion.* Kilmann and Thomas (1975) and Mills et al. (1985) reported that Es were more likely to use the assertive strategies of competition or collaboration and that Is were more likely to use either accommodation or avoidance.

(3) *Sensing-Intuition.* There were no replicated significant correlations with any of the MODE scales.

(4) *Judging-Perceiving.* There were no replicated significant correlations with any of the MODE scales.

The correlational analyses used in these preceding studies only considered the MBTI scales independently as predictors of the MODE. To unleash the full power of the MBTI, the present study examined MBTI scales separately and in interactive combinations. To ignore the possibility of interactive combinations is to miss a great deal of potentially interesting information, and it leaves the possibility that a relationship between any pair of variables will be canceled out by the uncontrolled interactive effects of the other variables.

The overriding hypothesis was that these separate scale effects would combine interactively, and that the analysis of psychological types would provide a more complete picture of the relationship between the MBTI and the MODE than that provided by previous research. As for the separate scale analyses, the results for the E-I, S-N, and T-F scales were expected to be consistent with previous research. Despite previous inconsistent results for the J-P scale, Ps, who are more open to information and therefore more adaptive in their judgments than Js, were predicted to be more likely to compromise or accommodate.

Method

Subjects. Data were collected from an initial sample and a replication sample. Each sample was quite diverse in its composition and different from the other.

Sample 1. The initial group of 160 subjects was

comprised of 86 males and 74 females. The average age was 28.5 years (range 18-57). The subjects were freshman, senior, or mature university students, high school teachers, recreational directors, and business students.

Sample 2. The replication group included 180 subjects (47 males and 133 females). The average age was 29 years (range 17-60). The subjects were freshman, senior, or mature students, elementary teachers, participants in a pre-marriage course, health care administrators, dietitians, and nurses.

Materials. Each subject completed the MBTI (Form G) and the Thomas Kilmann Conflict Mode Instrument (MODE). MODE is a forced-choice 30-item questionnaire which measures the reported usage of each of the five modes of conflict-handling. The format is paired comparison in which each mode is paired with each other mode three times. Scale scores are ipsative; that is, the summed scores across the five scales equals a constant.

Procedure. The MBTI and the MODE inventories were administered in the standard way to subjects prior to participation in workshop settings.

Results

Analysis 1. MBTI Scales as Predictors of MODE: Separate Dimensions vs. Interactive Combinations.

The test for each separate MBTI scale by each MODE scale. To test the relationship between each MBTI scale and each MODE scale, a separate 2 X 3 cross-tabulation table, i.e., the two MBTI scale directions by high, medium, and low scores on the MODE scale, was analyzed using the chi-square statistic. Cut-off points for the high and low categories on the MODE were placed to produce the best approximation to the upper and lower quadrants. The results are summarized in Table 1. Replicated effects were found for two MBTI scales: Fs were more likely than Ts to accommodate, and Is were more likely than Es to avoid.

The test for interactive combinations of MBTI scales by each MODE scale. MBTI scales are usually combined to produce 16 different types; however, because we did not find any evidence for significant effects for the S-N dimension, we collapsed across this dimension and report data for only 8 MBTI groups. The groups consisted of all scale combinations of the remaining three scales, that is, E-I by T-F by J-P. Each group contained subjects from 2 of the 16 types, the types within groups differing only on the S-N prefer-

ence. A separate 8 x 3 table, i.e., the 8 MBTI groups by high, medium, and low on the MODE, was analyzed for each conflict mode.

As indicated in Table 1, replicated effects were found for the four MBTI scale combinations for which thinking or feeling is the dominant function, that is, extraverted-thinking types (ESTJ or ENTJ) preferred competing; extraverted-feeling types (ESFJ or ENFJ) preferred collaborating; introverted-thinking types (ISTP or INTP) preferred compromising; and introverted-feeling types (ISFP or INFP) preferred avoiding.

The overall pattern was interactive and not predictable using the MBTI scales separately. The J-P scale used separately was not significant, but this scale is necessary to differentiate the significant types. Although Fs tended to accommodate, EFJs preferred to collaborate, and although Is tended to avoid, ITPs preferred to compromise. With such a clear indication of the importance of taking interactive combinations into account, we performed a more powerful analysis of the psychological types as indicators of the preferred mode of conflict resolution.

Analysis 2. MBTI Types as Predictors of a Hierarchy of Strategic Intentions. The second analysis differed from the first in two important ways:

(1) Strong exemplars of MBTI profiles. To select strong exemplars of each of the eight MBTI groups, the data from the two samples were pooled, and only subjects who had preference scores greater than 10 in the appropriate direction on the E-I, T-F, and J-P scales were used. The pooled sample contained 138 subjects: 25 ETJs, 13 ITPs, 8 ETPs, 26 ITJs, 19 EFJs, 10 IFPs, 19 EFPs, and 18 IFJs. Each group contained subjects from 2 of the 16 MBTI types, the types within each group differing only on their S-N preference.

(2) Ordinal MODE profiles. The MODE scales are ipsative, and it is appropriate to order the conflict modes from the most to the least preferred strategic intention. For each subject, the raw scale scores were rank ordered from one to five. In the absence of good normative data for our sample, raw scores were used. Any difference in the overall attractiveness of any one scale relative to the others would be controlled by the marginals of the chi-square table.

These data are summarized in Table 2, which orders the modes of conflict resolution for each MBTI group on the basis of the median rank. Within the ETJ group, a sex difference on the relative preference for competing required a separate group for males and females. This produced a 9 MBTI groups by 5 ranks frequency table for each mode. These tests were supplemented by direct between-group comparisons of preference for one mode versus another.

Table 1. Summary of Analysis 1 Data.

| Mode | Separate MBTI Scales | | | MBTI Scale Combinations | | |
	Scales	Sample 1	Sample 2	Group[a]	Sample 1	Sample 2
Avoid	I > E	$p < .01$	$p < .01$	I_FP	$p < .05$	$p < .01$
Compete	T > F	$p < .01$	n.s.	E_TJ	$p < .001$	$p < .01$
Compromise	T > F	n.s.	$p < .05$	I_TP	$p < .05$[b]	$p < .05$
Collaborate	F > T	$p < .05$	n.s.	E_FJ	$p < .01$[b]	$p < .05$
Accommodate	F > T	$p < .01$	$p < .01$			

[a]Only groups with replicated significance are listed.

[b]Reported significance is for a specific comparison between this MBTI group and all others combined.

The preference for the strategy to avoid conflict: Is > Es. This I > E main effect was a replicated finding in Analysis 1, and is readily apparent in the data of Table 2. The groups by ranks table for avoiding was significant [chi-square (138) = 63.15, p < .001], with strong first rank frequencies for IFPs, 70%, and ITJs, 42%, and tied first and second rank frequencies for IFJs at 44% each. As indicated in Table 2, the first preference for ITPs was to compromise, but 62% of ITPs ranked avoiding second.

In contrast to the other strategies which actively deal with the conflict, the strategy to avoid aborts the process and leaves the sources of conflict unchanged. The positioning of avoid in the ordinal MODE profiles of Table 2 is especially important, as strategies ranked lower are not likely to be actively engaged. Having established the main effect for E-I, and noting the interactive effect for ITP, we next considered the relative order of the four strategies to actively resolve conflict, which, considered independently of avoiding, evidenced a consistent interactive pattern.

The preferred strategy to actively resolve conflict: (a) ETJ males compete, other Ts compromise; (b) EFJs collaborate, other Fs accommodate. Considering only the relative order of these four strategies, the most preferred strategy for each group in Table 2 fits the rule without fail. The most preferred strategy for ETJ males was to compete [54% vs. 6% for the remaining subjects, phi (138) = .45, p < .001], and, in contrast, 69% of the remaining subjects ranked competing either last or next to last. Compromise was the preferred strategy for ETJ females (50%), ETPs (50%), and ITPs (62%). A comparison of these three groups versus other groups by first ranked versus lower ranked preference for compromising was significant [chi-square (138) = 11.54, p < .01]. Among the F groups, only EFJs preferred to col-

laborate [47% vs. 17% for the remaining subjects, phi (138) = .26, p < .01]. For the other F groups, the preference, not counting avoiding, was to accommodate, and in keeping with the replicated T-F effect for accommodating in Analysis 1, the overall groups by rank table for accommodating was significant [chi-square (138) = 53.78, p < .01]. Fifty-three percent of EFPs ranked accommodating first. For IFJs, accommodating and avoiding were essentially tied; nevertheless, 44% ranked accommodating first, and 83% either first or second. The IFPs' first preference was to avoid, so that only 30% ranked accommodating first, but 70% ranked it either first or second.

MODE profiles. The consistent pattern in Table 2 extends beyond the most preferred strategy to the overall MODE profiles for each group. There was a distinct order within each of the T-dominant, T-auxiliary, F-dominant, and F-auxiliary categories of Table 2 that became evident when some of the previously tested effects were removed, that is, the E-I difference in the rank for avoiding and the specific first ranked effects for competing and collaborating. Not considering the rank for competing or avoiding, the order for the remaining strategies for the T-dominant groups was compromise > collaborate > accommodate, and the order for the T-auxiliary groups was compromise > accommodate > collaborate. This difference was in the relative order of accommodating and collaborating and was tested by selecting all subjects with compromising ranked first; 75% of T-dominant subjects ranked collaborating before accommodating, but 83% of all remaining T or F subjects reversed the order [phi (41) = .55, p < .001]. Not counting avoiding or collaborating, the order for the remaining strategies was the same across all F groups: accommodate > compromise > compete. The T-auxiliary and F-auxiliary orders differed only in the rela-

Table 2. A Hierarchy of Conflict-Handling Strategies for Each MBTI Group (Median Ranks in Parentheses).

Strategic Intentions Ordered by Median Rank

Most Preferred <- -> Least Preferred

Thinking Dominant

E_TJ males
compete (1.44)   compromise (2.21)   collaborate (2.64)   ▪▪ ▪▪ (3.01)   accommodate (3.26)

E_TJ females
compromise (1.51)   collaborate (2.39)   accommodate (2.51)   ▪▪ ▪▪ (3.18)   compete (3.51)

I_TP
compromise (1.32)   ▪▪ ▪▪ (2.20)   collaborate (3.26)   compete (3.39)   accommodate (3.76)

Thinking Auxiliary

E_TP
compromise (1.51)   accommodate (2.18)   ▪▪ ▪▪ (3.51)   collaborate (4.01)   compete (4.71)

I_TJ
▪▪ ▪▪ (1.84)   compromise (2.26)   accommodate (2.62)   collaborate (3.71)   compete (4.29)

Feeling Dominant

E_FJ
collaborate (1.76)   accommodate (2.39)   compromise (2.44)   ▪▪ ▪▪ (2.67)   compete (4.45)

I_FP
▪▪ ▪▪ (1.22)   accommodate (2.01)   compromise (2.31)   collaborate (3.84)   compete (4.89)

Feeling Auxiliary

E_FP
accommodate (1.46)   compromise (2.14)   ▪▪ ▪▪ (3.01)   collaborate (3.76)   compete (4.56)

I_FJ
▪▪ ▪▪ (1.64)   accommodate (1.64)   compromise (2.89)   collaborate (3.64)   compete (4.52)

Note: The vertical barrier indicates the order of the strategy to avoid conflict. It is assumed that avoidance at this point aborts the process so that lower ranked strategies will not likely be used.

tive rank of compromising and accommodating. Not counting the previously tested effects for competing, collaborating, and avoiding, the remaining variability was largely accounted for by the overall significant T-F difference in the relative preference for compromising and accommodating: 65% of the Ts preferred compromising to accommodating, but 67% of the Fs preferred accommodating to compromising [phi (120) = .32, $p < .001$].

Discussion

There was a consistent pattern within these results that is easily interpreted with MBTI theory. Considering first the strategies preferred by Ts, both competition and compromise are based on a calculus of gains or losses, that is, to either win your position or to give up something to gain something. The authors of the MODE instrument (Kilmann & Thomas, 1977) have proposed a distributive dimension with competition as the winning strategy, compromise in the middle, and accommodation as the most "giving-up" strategy, and indeed, this order fits the ETJ males in the present study: that is, compete first, then compromise, but don't accommodate. Apparently what is required for such an assertive engagement is an orientation toward maintaining one's judgment, and the dominant thinking function extraverted toward the overt context. But for the majority of Ts, compromise was not just a fall-back strategy, it was the perfect strategy, and for most of these subjects, compete was ranked last or next to last. This suggests an appreciation for compromise as more than a distributive strategy. Perhaps it was valued as an adaptive strategy, or even a thinking person's way of cooperating.

Next, considering the strategies preferred by Fs, collaboration and accommodation are cooperative strategies. According to MBTI theory, the feeling function, which best predicts a cooperative strategy, includes social feelings directed toward others and an emotional investment in maintaining harmony in relationships. This correlation between feeling and cooperation was consistently reported by past research for accommodation and combined accommodation-collaboration scores, but consistent results were not reported for collaboration alone.

The present research clarifies these results. It was the EFJs, with a judging orientation and the dominant feeling function extraverted toward the overt conflict situation, who preferred to collaborate. The other Fs tended to prefer accommodation and to rank collaboration next to last, so it is unlikely that the EFJs would carry the collaboration-feeling relationship to significance in a correlational analysis. That only EFJs preferred to collaborate suggests that a judging orientation and the dominant extraverted feeling function are required for the active engagement and working

through to a mutually beneficial position required by a collaborative strategy.

If accommodation were simply the unassertive and losing strategy that it appears to be from a T-dominant perspective, it is unlikely that it would be preferred by such a substantial proportion of the sample. Like compromise, accommodation must be more than a fall-back strategy for the unassertive. We interpret that the accommodator's feeling-values are invested in maintaining the relationship, and that these determine positive outcomes in the long run. These qualitative, feeling-valued outcomes, which literally "don't count" to the quantitative thinker, are what is won through accommodation.

It is well established on the basis of both past and present research that introverts prefer to avoid active engagement in the process of conflict resolution. The exception was the ITP group, whose first preference was to compromise, second preference to avoid rather than engage in collaboration or competition, and who, like other T-dominants, preferred not to accommodate. We surmise that ITPs are able to compromise because it enables them to maintain internal consistency, in keeping with their dominant introverted thinking function, while maintaining an adaptive-perceptive stance in the overt context. This resolves the immediate conflict, but leaves them open to new information or future possibilities.

Extraverted perceptives, ETPs and EFPs, prefer the adaptive functions of compromise and accommodation, and will avoid rather than collaborate or compete. The dominant, extraverted sensing or intuitive function plus a perceptive orientation would leave them open to the facts or possibilities presented by others in the process of conflict resolution.

In summary, the method of analysis, which investigated interactive combinations of MBTI scales and used statistical analyses which were appropriate for the ipsative scales of the MODE instrument, provided a more complete picture than previous research of the relationship between the MBTI scales and the MODE scales. The results are more complete in the number and specificity of significant statistical relationships, and more complete in goodness of fit with the MBTI theory. The complex interactive patterns of these relationships not only enhance our understanding of the MBTI types, but also suggest revisions in the conceptualization of the modes of conflict handling intention.

As a final qualification to these claims, we acknowledge the importance of the context in determining conflict-handling intentions. The MBTI scales and the MODE scales measure context-independent preferences for the use of the attitudes and functions and conflict-handling intentions, respectively. For example, one can easily imagine a person who is not inclined to endorse a generalized, cross-situational

preference for competition nevertheless competing in a context in which that would be the most appropriate strategy. There is a need for research which takes into account contextual factors.

References

Chanin, M. N., & Schneer, J. A. (1984). A study of the relationship between Jungian personality dimensions and conflict-handling behavior. *Human Relations, 37,* 863-879.

Coser, L. (1956). *The functions of social conflict.* New York: The Free Press.

Kilmann, R. H., & Thomas, K. W. (1975). Interpersonal conflict-handling behavior as reflections of Jungian personality dimensions. *Psychological Reports, 37,* 971-980.

Kilmann, R. H., & Thomas, K. W. (1977). Developing a forced-choice measure of conflict-handling behavior: The "MODE" instrument. *Educational and Psychological Measurement, 37,* 309-375.

Mills, J., Robey, D., & Smith, L. (1985). Conflict-handling and personality dimensions of project-management personnel. *Psychological Reports, 57,* 1135-1143.

Myers, I. B., & McCaulley, M. H. (1985). *Manual: A guide to the development and use of the Myers-Briggs Type Indicator.* Palo Alto, CA: Consulting Psychologists Press.

Thomas, K. W. (1982). Manager and mediator: A comparison of third-party roles based on conflict management goals. In G. Bowers & R. Peterson (Eds.), *Conflict management and industrial relations.* Boston: Kluwer-Nijhoff.

Thomas, K. W. (1988). The conflict-handling modes: Toward more precise theory. *Management Communication Quarterly, 1,* 430-435.

Acknowledgments

Contact

Dr. Terrance Q. Percival
University of Prince Edward Island
550 University Avenue
Charlottetown, Prince Edward Island
Canada C1A 4P3

(902) 566-0563

*   *   *