BOUNDARY LOGIC AS ENCRYPTION PUZZLE

William Bricken October 1985

This puzzle is a logical tautology. The words are meant to be semantically confusing, they may as well be meaningless letters.

When phrased as logic, the tautology is fairly easy to deconstruct. However the puzzle can be transcribed into boundary logic, which consists of only parens and words. Without knowing the boundary logic encoding, deconstructing the tautology is very difficult.

LOGIC PUZZLE WITHOUT SHAPE

(IMP (OR (IF THE (EQUIV (IF (IMP (AND WONDER HARD NIL EVIDENCE) LOGIC) THAT (OR CLUE (IMP IS SIMPLE) KNOW TRICK (IF (NOT (NOT FIGURE)) THOSE PICKLE))) THE) SOLVE) (EQUIV (NOT (IMP (OR THESE (NOT (FALSE)) DANGER) (IF (NOT THE) (NOT (NOT THIS)) (AND (OR (AND LEAD GUESS (NOT KEY) (IF HAPPY (IF COMPLEX ARE MEANING) DILEMMA)) THE) (IMP THE (NOT WAS)))))) THE) (AND (NOT (AND THE (IF THE (NOT EASY) (OR HINT THINK (EQUIV IN CHANCE) (AND LOVE THEM SUGGEST) CONFUSE (IF WERE WORK (NOT (NOT MAZE))))))) (OR THE PUZZLE))) (AND CUE EXPLAIN (NOT (TRUE)) PROBLEM (IF (NOT (NOT OUT)) LUCK TIP)))

LOGIC PUZZLE WITH SHAPE

```
(IMP (OR (IF THE
             (EQUIV (IF (IMP (AND WONDER HARD NIL EVIDENCE)
                              LOGIC)
                        THAT
                        (OR CLUE
                             (IMP IS SIMPLE)
                             KNOW
                             TRICK
                             (IF (NOT (NOT FIGURE)) THOSE PICKLE)))
                    THE)
             SOLVE)
         (EQUIV (NOT (IMP (OR THESE (NOT (FALSE)) DANGER)
                          (IF (NOT THE)
                               (NOT (NOT THIS))
                               (AND (OR (AND LEAD
                                             GUESS
                                             (NOT KEY)
                                             (IF HAPPY
                                                (IF COMPLEX ARE MEANING)
                                                 DILEMMA))
                                        THE)
                                    (IMP THE (NOT WAS)))))
                THE)
         (AND (NOT (AND THE
                        (IF THE
                             (NOT EASY)
                             (OR HINT
                                 THINK
                                 (EQUIV IN CHANCE)
                                 (AND LOVE THEM SUGGEST)
                                 CONFUSE
                                 (IF WERE WORK (NOT (NOT MAZE)))))))
              (OR THE PUZZLE)))
      (AND CUE
           EXPLAIN
           (NOT (TRUE))
           PROBLEM
           (IF (NOT (NOT OUT)) LUCK TIP)))
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BOUNDARY LOGIC FORM (no reduction rules applied)

((((THE)((((((WONDER)(NIL) LOGIC (HARD)(EVIDENCE)))) THAT)
((((WONDER)(EVIDENCE) CLUE (IS) KNOW (HARD)(NIL))) SIMPLE LOGIC TRICK
(((((FIGURE))) THOSE)(((FIGURE)) PICKLE)))) THE)((((((NIL (HARD))
(EVIDENCE)(WONDER)(HARD))) LOGIC) THAT)(((CLUE (EVIDENCE) SIMPLE
(HARD)(NIL)(WONDER))) TRICK (IS) LOGIC KNOW ((((FIGURE))) THOSE)
(((FIGURE)) PICKLE)))))(THE)))(THE SOLVE))(((THESE (FALSE) DANGER)
((((THE))((THIS)))((THE)((((LEAD)(GUESS)((KEY))((((HAPPY)(((COMPLEX) ARE)
((((THESE (FALSE) DANGER) ((((THE))((THIS)))((THE) ((((LEAD)(GUESS)((KEY))
((((HAPPY) (((COMPLEX) ARE)(COMPLEX MEANING)))(DILEMMA HAPPY)))) THE)
(((THE)(WAS)))))))(THE))((((THE)(((THE) EASY))(THE (IN CHANCE) HINT THINK
((IN)(CHANCE))((LOVE)(THEM)(SUGGEST)) CONFUSE ((WERE) WORK)(WERE
((MAZE))))))))))) (THE PUZZLE))) ((CUE)(EXPLAIN)((TRUE))(PROBLEM)
((((((OUT))) LUCK)(((OUT)) TIP)))))