

# PROPOSED MODIFICATIONS TO THE SNOBOL SYSTEM

1. FIX CURRENT GARBAGE COLLECTOR AND COMPILE()
2. PRODUCE INTERNAL DOCUMENTATION (MAINLY A DESCRIPTION OF ALL DATA STRUCTURES)
3. GENERATE COMPILER DIAGNOSTICS WITH CURSOR. ~~GENERAL IMPROVEMENTS~~ ~~IN~~ LISTING FORMAT
4. BREAK UP ~~COMPILER~~ SNOBOL SYSTEM INTO RELOCATABLE PACKAGES
5. IMPROVE RUN-TIME STORAGE ALLOCATION SUCH THAT ARRAYS AND DATA CAN BE GARBAGE COLLECTED
6. PROVIDE TRACE FACILITIES TO TRACE ASSIGNMENTS, AND PROCEDURE CALLS, AND LABELS
7. IMPLEMENT THE APPLY() FUNCTION (SHOULD WORK FOR FIELDS, TOO!)
8. IMPLEMENT THE PROTOTYPE() FUNCTION FOR ARRAYS DATA STRUCTURES PATTERNS (SEE BELOW FOR EXPLANATION)
9. A PAIR OF FUNCTIONS TO TAKE PATTERNS APART. (WE DON'T KNOW A GOOD NAME FOR THEM YET) E. G.  
FIRST(A | B) YIELDS THE PATTERN A  
REST(A | B) " " B  
PROTOTYPE(A | B) YIELDS THE STRING 'ALT(FIRST, REST)'
10. IMPROVE THE SPEED OF ANY-NOTANY-SPAN-BREAK BY USING A BIT TABLE.
11. (LAST BUT NOT LEAST) FIX SMALL BUGS, IN PARTICULAR: F(F), (OUTPUT)=, \*TRIM(A).