What Languages Fix

Kevin Kelleher suggested an interesting way to compare programming  
languages: to describe each in terms of the problem it  
fixes. The surprising thing is how many, and how well, languages can be  
described this way.  
  
Algol: Assembly language is too low-level.Pascal: Algol doesn't have enough data types.Modula: Pascal is too wimpy for systems programming.  
Simula: Algol isn't good enough at simulations.Smalltalk: Not everything in Simula is an object.Fortran: Assembly language is too low-level.Cobol: Fortran is scary.PL/1: Fortran doesn't have enough data types.Ada: Every existing language is missing something.Basic: Fortran is scary.APL: Fortran isn't good enough at manipulating arrays.J: APL requires its own character set.C: Assembly language is too low-level.C++: C is too low-level.Java: C++ is a kludge. And Microsoft is going to crush us.C#: Java is controlled by Sun.  
Lisp: Turing Machines are an awkward way to describe computation.Scheme: MacLisp is a kludge.T: Scheme has no libraries.Common Lisp: There are too many dialects of Lisp.Dylan: Scheme has no libraries, and Lisp syntax is scary.  
Perl: Shell scripts/awk/sed are not enough like programming languages.Python: Perl is a kludge.Ruby: Perl is a kludge, and Lisp syntax is scary.Prolog: Programming is not enough like logic.  
  
  
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