

Evolution of an algorithm: from diagram, to JJ pseudo-code, to Java code

Flow Block Diagram

JuniorJava (pseudo-code)

Actual Java code

t \ f	expr		
Line1		If expr then	if (expr) {
Lines		Line1	Line1;
LineL		LineL	LineL;
-----		Else	} else {
LineM		LineM	Line1;
Lines		Lines	Lines;
LineN		LineN	LineM;
		EndIf	//EndIf

Notice the line by line translation

An example

t \ f	x < y		
x <- 0		If (x < y) then	if (x < y) {
y <- y+1		Set x = 0	x = 0;
z <- z+2		Inc y by 1 Inc z by 2	y = y++; z += 2;
-----		Else	} else {
x <- x+y		Inc x by y	x = x + y;
y <- y-x		Dec y by x	y = y - x;
z <- x*y		Set z = x*y	z = x * y;
		EndIf	//EndIf

An example, without horizontal lines (notice the indentation)

t \ f	x < y		
x <- 0		If (x < y) then	if (x < y) {
y <- y+1		Set x = 0	x = 0;
z <- z+2		Inc y by 1 Inc z by 2	y = y++; z += 2;
		Else	} else {
x <- x+y		Inc x by y	x = x + y;
y <- y-x		Dec y by x	y = y - x;
z <- x*y		Set z = x*y	z = x * y;
		EndIf	//EndIf