

Cálculo First e Follow

| | FIRST | FOLLOW |
|-------------------------|--|--|
| Number | "DecLiteral", "OctLiteral", "HexLiteral", "FloatLiteral" | \$, ")", "}", " ", ".,", "&&", " ", ">", "<", ">=", "<=", "==", "!=", "+", "-", "*", "/", "┐" |
| PrefixGlobalLocal | "global.", "local." | "DecLiteral", "OctLiteral", "HexLiteral", "FloatLiteral", (, "Identifier", "StringLiteral", "true", "false", "-" |
| Program | "start", "Identifier", "function", "procedure", "const", "typedef", "struct", "var" | |
| GlobalDecl | "const", "var", "ε" | "start", "Identifier", "function", "procedure", "typedef", "struct" |
| Start | "start" | |
| Decls | "Identifier", "function", "procedure", "typedef", "struct", "ε" | "start" |
| Decl | "Identifier", "function", "procedure", "typedef", "struct" | "start", "Identifier", "function", "procedure", "typedef", "struct" |
| FormalParameterList | "DecLiteral", "OctLiteral", "HexLiteral", "FloatLiteral", "global.", "local.", "(", "Identifier", "StringLiteral", "true", "false", "-", "ε" |) |
| FormalParameterListRead | "Identifier" |)", " " |
| FunctionDeclaration | "function" | "start", "Identifier", "function", "procedure", "typedef", "struct" |
| ProcDecl | "Identifier", "procedure" | "start", "Identifier", "function", "procedure", "typedef", "struct" |
| Params | "Identifier", "const", "struct", "int", "real", "boolean", "string", "ε" |) |

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|-----------------------|--|---|
| Aux | “ ” “,” “=”, “[“ ” ” ” ” | “}”, “Identifier”, “struct”, “int”, “real”, “boolean”, “string” |
| DelimiterVar | “ ” “,” ” ” ” | “}”, “Identifier”, “struct”, “int”, “real”, “boolean”, “string” |
| Index | “DecLiteral”, “OctLiteral”, “Identifier” | “]” |
| Vector | “[“ ” ” | “ ” “,” “=” ” ” ” ” |
| Matrix | “[“ ” ” | “ ” “,” “=” ” ” ” ” |
| Assignment_vector | “=”, “ε” | “ ” “,” ” ” ” |
| Assignment_vector_aux | “=” | “ ” “,” ” ” ” |
| Value_assigned_vector | “DecLiteral”, “OctLiteral”, “HexLiteral”, “FloatLiteral”, “StringLiteral”, “true”, “false” | “}” |
| Assignment_matrix | “=”, “ε” | “ ” “,” ” ” ” |
| Assignment_matrix_aux | “=” | “ ” “,” ” ” ” |
| Dimensao_matrix | “ ” ,” | “ ” “,” ” ” ” |
| Value_assigned_matrix | “DecLiteral”, “OctLiteral”, “HexLiteral”, “FloatLiteral”, “StringLiteral”, “true”, “false” | “}” |
| While | “while” | “DecLiteral”, “OctLiteral”, “HexLiteral”, “FloatLiteral”, “global.”, “local.”, “(”, “}”, “Identifier”, “StringLiteral”, “var”, “while”, “true”, “false”, “if”, “read”, “print”, “return”, “-” |
| WhileProcedure | “while” | “DecLiteral”, “OctLiteral”, “HexLiteral”, “FloatLiteral”, “global.”, “local.”, “(”, “}”, “Identifier”, “StringLiteral”, “var”, “while”, “true”, “false”, “if”, “read”, “print”, “-” |
| BooleanLiteral | “true”, “false” | “)”, “}”, “ ” “,” “&&”, “ ”, “>”, “<”, “>=”, “<=”, “==”, “!=”, “+”, “-”, “*”, “/” |

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|-----------------------|---|---|
| ConditionalExpression | "DecLiteral", "OctLiteral" "HexLiteral", "FloatLiteral", "global.", "local.", "(", "Identifier", "StringLiteral", "true", "false", "!", "-" |) |
| If | "if" | "DecLiteral", "OctLiteral", "HexLiteral", "FloatLiteral", "global.", "local.", "(", "}", "Identifier", "StringLiteral", "var", "while", "true", "false", "if", "read", "print", "return", "_" |
| Then |) | "DecLiteral", "OctLiteral", "HexLiteral", "FloatLiteral", "global.", "local.", "(", "}", "Identifier", "StringLiteral", "var", "while", "true", "false", "if", "read", "print", "return", "_" |
| Else | "else", "ε" | "DecLiteral", "OctLiteral", "HexLiteral", "FloatLiteral", "global.", "local.", "(", "}", "Identifier", "StringLiteral", "var", "while", "true", "false", "if", "read", "print", "return", "_" |
| IfProcedure | "if" | "DecLiteral", "OctLiteral", "HexLiteral", "FloatLiteral", "global.", "local.", "(", "}", "Identifier", "StringLiteral", "var", "while", "true", "false", "if", "read", "print", "-" |
| ThenProcedure |) | "DecLiteral", "OctLiteral", "HexLiteral", "FloatLiteral", "global.", "local.", "(", "}", "Identifier", "StringLiteral", "var", "while", "true", "false", "if", "read", "print", "-" |
| ElseProcedure | "else", "ε" | "DecLiteral", "OctLiteral", "HexLiteral", "FloatLiteral", "global.", "local.", "(", "}", "Identifier", "StringLiteral", "var", "while", "true", "false", "if", "read", "print", "-" |

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|-------------------|--|---|
| Read | "read" | "DecLiteral", "OctLiteral", "HexLiteral", "FloatLiteral", "global.", "local.", "(", "{", "Identifier", "StringLiteral", "var", "while", "true", "false", "if", "read", "print", "return", "_" |
| Print | "print" | "DecLiteral", "OctLiteral", "HexLiteral", "FloatLiteral", "global.", "local.", "(", "{", "Identifier", "StringLiteral", "var", "while", "true", "false", "if", "read", "print", "return", _" |
| Body | "DecLiteral", "OctLiteral" "HexLiteral", "FloatLiteral", "global.", "local.", "(", "Identifier", "StringLiteral", "while", "true", "false", "if", "read", "print", return, "-", "ε" | "}" |
| BodyItem | "DecLiteral", "OctLiteral" "HexLiteral", "FloatLiteral", "global.", "local.", "(", "Identifier", "StringLiteral", "while", "true", "false", "if", "read", "print", return, "-" | "DecLiteral", "OctLiteral", "HexLiteral", "FloatLiteral", "global.", "local.", "(", "{", "Identifier", "StringLiteral", "var", "while", "true", "false", "if", "read", "print", "return", _" |
| ReturnStatement | "return" | "DecLiteral", "OctLiteral", "HexLiteral", "FloatLiteral", "global.", "local.", "(", "{", "Identifier", "StringLiteral", "var", "while", "true", "false", "if", "read", "print", "return", _" |
| BodyProcedure | "DecLiteral", "OctLiteral" "HexLiteral", "FloatLiteral", "global.", "local.", "(", "Identifier", "StringLiteral", "while", "true", "false", "if", "read", "print", return, "-", "ε" | "}" |
| BodyItemProcedure | "DecLiteral", "OctLiteral" "HexLiteral", "FloatLiteral", "global.", "local.", "(", "Identifier", "StringLiteral", "var", "while", "true", "false", "if", "read", "print", return, "-" | "DecLiteral", "OctLiteral", "HexLiteral", "FloatLiteral", "global.", "local.", "(", "{", "Identifier", "StringLiteral", "var", "while", "true", "false", "if", "read", "print", "-" |

| | | |
|------------------------|---|---|
| ConditionalOperator | "&&", " " | "DecLiteral", "OctLiteral", "HexLiteral", "FloatLiteral", "global.", "local.", "(", "Identifier", "StringLiteral", "true", "false", "!", "-" |
| LogicalDenied | "!" | "\")" |
| Logical | &&", " " | "\")" |
| ExpressionValueLogical | "DecLiteral", "OctLiteral"HexLiteral", "FloatLiteral", "global.", "local.", "(", "Identifier", "StringLiteral", "true", "false", "-" | "\)", "&&", " " |
| LogicalExpression | "DecLiteral", "OctLiteral"HexLiteral", "FloatLiteral", "global.", "local.", "(", "Identifier", "StringLiteral", "true", "false", "!", "-" | "\")" |
| RelationalExpression | "DecLiteral", "OctLiteral"HexLiteral", "FloatLiteral", "global.", "local.", "(", "Identifier", "StringLiteral", "true", "false", "-" | "\)", "&&", " " |
| Relational | ">", "<", ">=", "<=", "==", "!=" | "\)", "&&", " " |
| Assign | "DecLiteral", "OctLiteral"HexLiteral", "FloatLiteral", "global.", "local.", "(", "Identifier", "StringLiteral", "true", "false", "-" | "DecLiteral", "OctLiteral", "HexLiteral", "FloatLiteral", "global.", "local.", "(", ")", "Identifier", "StringLiteral", "var", "while", "true", "false", "if", "read", "print", "return", "-" |
| Exp | "DecLiteral", "OctLiteral"HexLiteral", "FloatLiteral", "global.", "local.", "(", "Identifier", "StringLiteral", "true", "false", "-" | "\)", " ", "&&", " ", ">", "<", ">=", "<=", "==", "!=" |
| AddExp | "+", "-", "ε" | "\)", " ", "&&", " ", ">", "<", ">=", "<=", "==", "!=" |
| Term | "DecLiteral", "OctLiteral"HexLiteral", "FloatLiteral", "(", "Identifier", "StringLiteral", "true", "false", "-" | "\)", " ", "&&", " ", ">", "<", ">=", "<=", "==", "!=", "+", "-" |
| MultExp | "*", "/", "ε" | "\)", " ", "&&", " ", ">", "<", ">=", "<=", "==", "!=", "+", "-" |

| | | |
|-----------------|--|---|
| ExpressionValue | "DecLiteral", "OctLiteral"HexLiteral", "FloatLiteral", "(", "Identifier", "StringLiteral", "true", "false", "-" |)", " ", " ", " ", "&&", " ", ">", "<", ">=", "<=", "==", "!=", "+", "-", "*", "/" |
|-----------------|--|---|