

Example:

IF_STAT \rightarrow if COND then STAT (else STAT)? fi

```
Boolean if_stat(*AST tree)
{
    Token tok;
    AST condition, if_clause, else_clause;

    if (!matchtoken(IF_TOKEN, &tok))
        return false;

    condition(&condition);
    matchtoken(THEN_TOKEN, &tok);
    statement(&if_clause);
    if (matchtoken(ELSE_TOKEN, &tok))
        statement(&else_clause);
    else
        else_clause = null;
    matchtoken(FI_TOKEN, &tok);

    tree = new AST(
        IF_STAT, condition, if_clause, else_clause);
    return true;
}

// if the next token is of type kind
// matchtoken consumes it and returns true
// else it returns false
Boolean matchtoken(int kind, Token *tok)
{
    if (lookahead.kind!=kind)
        return false;
    gettoken(tok);
    return true;
}
```