KeyDefs: DEFINITIONS = BEGIN

    updown: TYPE = {down, up};

    KeyArray: TYPE = ARRAY [0..5] OF WORD;

    KeyBits: TYPE = MACHINE DEPENDENT RECORD [
        blank: [0..377B],
        Keyset1, Keyset2, Keyset3, Keyset4, Keyset5: updown,
        Red, Blue, Yellow: updown,
        Five, Four, Six, E, Seven, D, U, V,
        Zero, K, Dash, P, Slash, BackSlash, LF, BS: updown,
        Three, Two, W, Q, S, A, Nine, I,
        X, O, L, Comma, Quote, RightBracket, Spare2, Spare1: updown,
        One, ESC, TAB, F, Ctrl, C, J, B,
        Z, LeftShift, Period, SemiColon, Return, Arrow, DEL, FL3: updown,
        R, T, G, Y, H, Eight, N, M,
        Lock, Space, LeftBracket, Equal, RightShift, Spare3, FL4, FR5: updown];

    Keys: POINTER TO KeyBits = LOOPHOLE[177033B];

    MouseButton: TYPE = {RedYellowBlue, RedBlue, RedYellow, Red, BlueYellow, Blue, Yellow, None};

    MouseBits: TYPE = MACHINE DEPENDENT RECORD [
        blank: [0..377B], -- Diablo, Versatec, etc.
        keyset: [0..37B], -- 0 => down, i.e. normal state is 37B
        buttons: MouseButton]; -- 0=> down, normal is 7B = MouseButton[None]

    Mouse: POINTER TO MouseBits = LOOPHOLE[Keys];

    KeyName: TYPE = {
        x0, x1, x2, x3, x4, x5, x6, x7,
        Keyset1, Keyset2, Keyset3, Keyset4, Keyset5,
        Red, Blue, Yellow,
        Five, Four, Six, E, Seven, D, U, V,
        Zero, K, Dash, P, Slash, BackSlash, LF, BS,
        Three, Two, W, Q, S, A, Nine, I,
        X, O, L, Comma, Quote, RightBracket, Spare2, Spare1,
        One, ESC, TAB, F, Ctrl, C, J, B,
        Z, LeftShift, Period, SemiColon, Return, Arrow, DEL, FL3,
        R, T, G, Y, H, Eight, N, M,
        Lock, Space, LeftBracket, Equal, RightShift, Spare3, FL4, FR5};

    -- Alto II names for some keys can be different

    FL1: KeyName = DEL;
    FL2: KeyName = LF;
    BW: KeyName = Spare1;
    FR1: KeyName = Spare3;
    FR2: KeyName = BackSlash;
    FR3: KeyName = Arrow;
    FR4: KeyName = Spare2;

    KeyItem: TYPE = RECORD [
        Letter: BOOLEAN,
        ShiftCode: [0..177B],
        NormalCode: [0..377B]];)

    ChangeKey: PROCEDURE [key: KeyName, action: KeyItem] RETURNS [oldAction: KeyItem];

    Keyboard: PROGRAM;
    KeyStreams: PROGRAM;

END.