

MorseMail Home | Joystick connection | Mouse connection

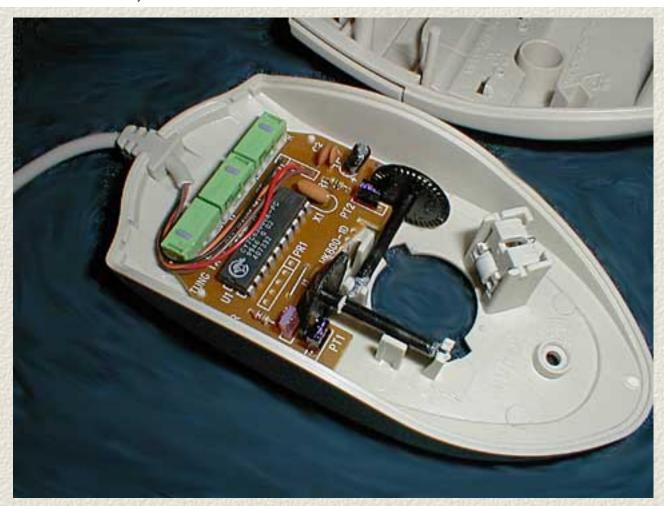
MorseMail key/paddle interface

Here are a few images of the modification I made to a cheap PC Concepts 3-button USB mouse (you can get <u>new ones for \$6</u>) just to give you an idea of what is involved. The beauty of the USB mouse approach is that it can be operated in parallel with your main mouse.

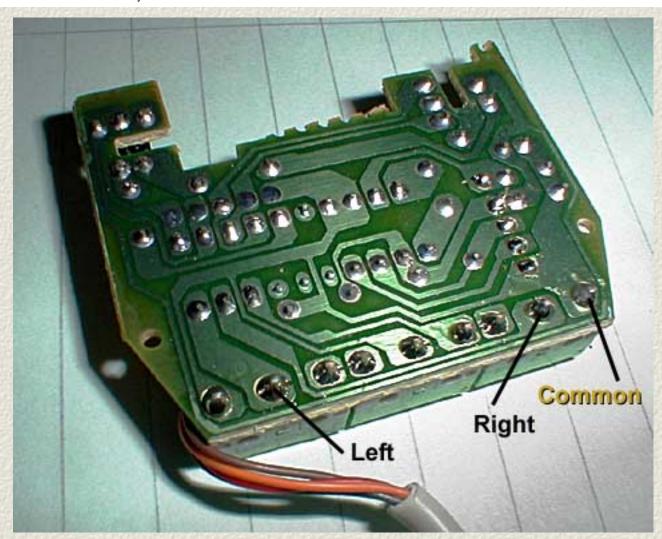
Here is the mouse as it comes out of the box. Only \$6 -- wow -- and it is actually a pretty good mouse.



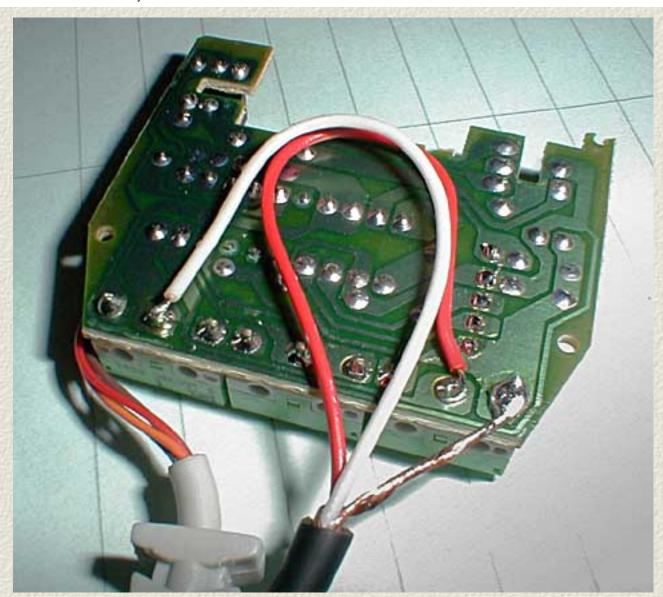
But this mouse is going to live no ordinary life! Notice the three micro-switches for the three mouse buttons. Oh good, dry contacts, just what we need.



Just lift out the circuit board and flip it over. Notice that all three switches are connected to a "common" wire. Each has its center pin connected to a separate controller IC pin and a third pin unconnected.



So, we wire up our paddle/key cable appropriately.



Then the fun begins -- cramming it all back in the package. But if you are careful, you can get it all back together and still have the original mouse buttons working. Just be careful not to have any of the wires pierced by the sharp pins on the bottom of the circuit board. A problem I had with the above wiring was the shield wire interfered with some plastic in the base which had to be removed.

When I modified a second mouse, I decided to install a standard 1/4" stereo jack with connections compatible with my Icom 751A transceiver. So here is the setup on the corner of my computer desk. The gray wire coming out from under the Bencher brings out the dot connection for the straight key (as required by the 751A).



(You might notice that I have modified the Bencher paddles to mount inside the levers to give the narrower spacing I happen to prefer. Also, the dot paddle is custom built to stick out further to accommodate the fact that my thumb doesn't extend as far as my forefinger.)

There was just enough room in the mouse ball cavity to contain the jack.



All of this is very much in its formative stages and any feedback would be gladly accepted.

73, Harry, AB7TB

```
<MorseMail>
+63-48+71-312+71-56+71-48+71-55
+71-216+183-64+183-64+191-192+79-39
+200-56+191-56+63-183+63-432+63-64
+55-56+191-320+64-47+63-56+183-56
+63-176+63-48+55-200+183-55+72-184
+199-32+55-64+72-455+207-192+79-40
+71-48+71-48+79-192+80-39+79-200
+79-40+72-47+71-424+79-31+71-48
+224-247+71-48+63-64+71-176+71-184
+71-47+64-64+192-55+71-184+63-56
+55-64+184-152+71-56+207-56+55-56
+64-207+192-63+199-48+71-55+63-56
+207-56+184-423+71-48+79-184+207-304
+199-48+63-56+199-48+55-199+71-160
+63-55+184-56+63-200+200-167+71-56
```

```
+191-168+63-48+71-192+199-47+63-184
+63-56+183-64+56-47+63-200+191-56
+63-64+183-56+199-407+71-48+80-175
+63-40+79-48+71-383+63-184+71-40
+199-176+72-39+71-56+71-176+72-39
+71-192+63-176+71-56+199-48+55-424
+207-176+191-72+183-71+199-384+71-40
+63-48+71-192+63-192+191-56+63-192
+191-56+55-56+48-399+183-64+199-208
+175-56+175-72+191-176+71-56+184-55
+63-184+72-55+63-56+55-208+79-184
+191-56+207-152+71-56+191-152+47-56
+71-184+47-64+192-55+55-56+63-392
+71-48+183-64+183-208+63-32+71-216
+207-184+71-48+63-56+63-56+55-480
+79-48+199-64+55-192+55-167+47-72
+167-160+63-56+207-48+63-56+55-520
+183-56+55-64+191-176+63-200+191-39
+71-48+199-56+191-152+71-40+63-56
+63-336+55-64+56-55+64-63+55-200
+79-144+71-416+183-47+175-64+71-40
+63-40+87-192+63-40+71-56+64-56
+191-56+207-240+63-40+71-40+71-56
+191-55+63-56+191-327+72-191+63-100
</MorseMail>
```

last edited 2000-12-11