

Holger Wurtz MicroDexed



Introduction

This EFX is a port of the [MicroDexed](#) originally created for the Teensy, which was a port of [Dexed](#), a multi-platform synthesizer based on the Yamaha DX7.

The DX7 is the quintessential 1980s FM synth and was used on countless albums and sound tracks from that era.

For the most up to date descriptions of each EFX control, please see the descriptions by right-clicking on the EFX from the Effect Library in the Designer application.

DX7 Patches

The DX7 engine uses binary patches to program the FM synthesis engine. The original Yamaha synthesizer used ROM cartridges to provide different patches.

The MicroDexed project for Teensy curated 10 cartridges, each with 32 voices. Please note there is overlaps between these cartridges and some voices are repeated or very similar.

Since those 320 patches are a bit much to navigate, for the Multiverse port is a subset that has been curated further and organized into categories. These are the instrument knobs shown in the GUI, and you can use the INST. SEL knob to chose which category is active.

A special EXTRA category is provided for one of the famous FineTails collection.

However, you can still access all 320 patches from the original MicroDexed project by accessing the hidden controls in the EFX UI. Change the viewing mode from GFX to ALL by clicking on the button and look for the controls “Bank Select” and “Voice Select”.

You can select the ROM cartridge from 1 to 10 with Bank Select, and the activated voice from 1 to 32 with Voice Select.

To help you figure out what the sounds are, a (long) list of the full catalog is provided below. Enjoy!

320 Voice Catalog

NOTE: voice IDs here range from 0 to 31, so add 1 to get the voice

ID in the range 1 to 32 used by the Voice Select knob.

#Bank 1 - RitCh1.syx

v:4 -> Steinway

v:0 -> FM-Rhodes

v:5 -> Korg CX3 (Synth)

v:1 -> FM-Rhodes2

v:6 -> Leadharp (Synth, Strings)

v:2 -> Meinecke

v:7 -> Synclavier (Synth)

v:3 -> CCCP-70

v:8 -> ELEC VANG

v:9 -> FATSO. RT. (Synth)
 v:10 -> FATSYNTH A
 v:11 -> JUPITER 1
 v:12 -> JUPITER 8 (Synth)
 v:13 -> Jupiter
 v:14 -> ANALOG 2
 v:15 -> JUNO 106 6 (Synth, maybe)
 v:16 -> ALG.2. RT.
 v:17 -> Mooger Low (Percussive synth)
 v:18 -> Soft-Moog
 v:19 -> Mooger
 v:20 -> Mini-Moog (Synth)
 v:21 -> Mini-Moog2
 v:22 -> Moog Strng
 v:23 -> ANASTRINGS
 v:24 -> ANALOG 1
 v:25 -> ANALOG
 v:26 -> Horn+Str.
 v:27 -> St Pad 4c (Synth)
 v:28 -> St Pad 5c
 v:29 -> STRINGS M2
 v:30 -> SAMPLESTRG
 v:31 -> MID.STRG B

#Bank 2 - RitCh2.syx

v:0 -> HORNS 5A W (Synth)
 v:1 -> 80 F (Synth)
 v:2 -> 8BRASS 3 (Brass)
 v:3 -> JUMP
 v:4 -> JUMP 2SENS
 v:5 -> FLUTE 1 (WIND)

v:6 -> CORNET HS
 v:7 -> CP 90
 v:8 -> B-R-ASS 1 (Brass)
 v:9 -> BASS 1 (Bass)
 v:10 -> SCHMIDT 2
 v:11 -> FUNK-RHYT. (Synth)
 v:12 -> KLA5 HS (Synth)
 v:13 -> D 5-6..... (Plucked)
 v:14 -> CLIC HS (Organ)
 v:15 -> JUMP 3
 v:16 -> ORGEL 1 (organ)
 v:17 -> B 3 ORGAN
 v:18 -> PIANO 2
 v:19 -> BREAK FREE
 v:20 -> BASCHMIDT (Bass)
 v:21 -> RHODES1 RH
 v:22 -> RHODES 2
 v:23 -> HOHNER D 6
 v:24 -> SYNTH R.T. (Synth)
 v:25 -> STRING SYN
 v:26 -> FANFARE H1
 v:27 -> JUNK (Strings)
 v:28 -> --OBERHEIM (Strings)
 v:29 -> CHOIR. (Choir/Vocal)
 v:30 -> BRS.STRS. (Brass)
 v:31 -> LAAZCHRD1 (Synth)

#Bank 3

v:0 -> BRASS 1
 v:1 -> BRASS 2 (Synth)
 v:2 -> BRASS 3

v:3 -> STRINGS 1
 v:4 -> STRINGS 2
 v:5 -> STRINGS 3
 v:6 -> ORCHESTRA (Synth)
 v:7 -> PIANO 1
 v:8 -> PIANO 2
 v:9 -> PIANO 3
 v:10 -> E.PIANO 1
 v:11 -> GUITAR 1 (Plucked)
 v:12 -> GUITAR 2
 v:13 -> SYN-LEAD 1 (Synth)
 v:14 -> BASS 1 (repeat)
 v:15 -> BASS 2 (Bass)
 v:16 -> E.ORGAN 1
 v:17 -> PIPES 1 (Wind)
 v:18 -> HARPSICH 1
 v:19 -> CLAV 1
 v:20 -> VIBE 1 (Bells)
 v:21 -> MARIMBA (Percussion)
 v:22 -> KOTO (Synth)
 v:23 -> FLUTE 1
 v:24 -> ORCH-CHIME
 v:25 -> TUB BELLS (Bells)
 v:26 -> STEEL DRUM (Percussion)
 v:27 -> TIMPANI (Percussion)
 v:28 -> REFS WHISL
 v:29 -> VOICE 1 (Choir/Vocal)
 v:30 -> TRAIN
 v:31 -> TAKE OFF

#Bank 4

v:0 -> PIANO 4
 v:1 -> PIANO 5
 v:2 -> E.PIANO 2
 v:3 -> E.PIANO 3
 v:4 -> E.PIANO 4
 v:5 -> PIANO 5THS
 v:6 -> CELESTE (Bells)
 v:7 -> TOY PIANO
 v:8 -> HARPSICH 2
 v:9 -> HARPSICH 3
 v:10 -> CLAV 2
 v:11 -> CLAV 3 (Synth)
 v:12 -> E.ORGAN 2
 v:13 -> E.ORGAN 3
 v:14 -> E.ORGAN 4
 v:15 -> E.ORGAN 5
 v:16 -> PIPES 2
 v:17 -> PIPES 3 (Pipes)
 v:18 -> PIPES 4 (Pipes)
 v:19 -> CALIOPE
 v:20 -> ACCORDION (Synth)
 v:21 -> SITAR (Synth)
 v:22 -> GUITAR 3
 v:23 -> GUITAR 4
 v:24 -> GUITAR 5
 v:25 -> GUITAR 6
 v:26 -> LUTE
 v:27 -> BANJO
 v:28 -> HARP 1
 v:29 -> HARP 2 (Synth)
 v:30 -> BASS 3

v:31 -> BASS 4 (Bass)

#Bank 5

v:0 -> PICCOLO

v:1 -> FLUTE 2

v:2 -> OBOE (Winds)

v:3 -> CLARINET (winds)

v:4 -> SAX BC

v:5 -> BASSOON

v:6 -> STRINGS 4

v:7 -> STRINGS 5

v:8 -> STRINGS 6

v:9 -> STRINGS 7

v:10 -> STRINGS 8

v:11 -> BRASS 4

v:12 -> BRASS 5 (Brass)

v:13 -> BRASS 6 BC

v:14 -> BRASS 7 (Brass)

v:15 -> BRASS 8

v:16 -> RECORDER (Winds)

v:17 -> HARMONICA1

v:18 -> HRMNCA2 BC

v:19 -> VOICE 2 (Choir/Vocal)

v:20 -> VOICE 3

v:21 -> GLOKENSPL (Percussive)

v:22 -> VIBE 2

v:23 -> XYLOPHONE (Percussive)

v:24 -> CHIMES

v:25 -> GONG 1

v:26 -> GONG 2 (Synth)

v:27 -> BELLS (Bells)

v:28 -> COW BELL (Percussive)

v:29 -> BLOCK (Percussive)

v:30 -> FLEXATONE

v:31 -> LOG DRUM (Percussive)

#Bank 6

v:0 -> SYN-LEAD 2

v:1 -> SYN-LEAD 3 (Synth)

v:2 -> SYN-LEAD 4 (Bass)

v:3 -> SYN-LEAD 5

v:4 -> SYN-CLAV 1

v:5 -> SYN-CLAV 2

v:6 -> SYN-CLAV 3 (CRAZY!)

v:7 -> SYN-PIANO

v:8 -> SYNBRASS 1

v:9 -> SYNBRASS 2 (Synth)

v:10 -> SYNORGAN 1

v:11 -> SYNORGAN 2

v:12 -> SYN-VOX (Winds)

v:13 -> SYN-ORCH (Winds)

v:14 -> SYN-BASS 1

v:15 -> SYN-BASS 2

v:16 -> HARP-FLUTE

v:17 -> BELL-FLUTE (Bell)

v:18 -> E.P-BRS BC

v:19 -> T.BL-EXPA (Bell, GREAT!)

v:20 -> CHIME-STRG (Bell)

v:21 -> B.DRM-SNAR (Percuss)

v:22 -> SHIMMER

v:23 -> EVOLUTION

v:24 -> WATER GDN

v:25 -> WASP STING

v:26 -> LASER GUN

v:27 -> DESCENT

v:28 -> OCTAVE WAR (Synth)

v:29 -> GRAND PRIX

v:30 -> ST.HELENS

v:31 -> EXPLOSION

#Bank 7

v:0 -> FLUTE 1

v:1 -> HARPSICH 1

v:2 -> STRG ENS 1 (Strings, great!)

v:3 -> BRIGHT BOW (Strings, great!)

v:4 -> BRASSHORNS

v:5 -> BR TRUMPET

v:6 -> MARIMBA (Percuss, repeat)

v:7 -> E.PIANO 1

v:8 -> PIANO 1

v:9 -> PIPES 1 (repeat)

v:10 -> E.ORGAN 1

v:11 -> E.BASS 1

v:12 -> CLAV 1

v:13 -> HARMONICA1

v:14 -> JAZZ GUIT1

v:15 -> PRC SYNTH1

v:16 -> SAX BC

v:17 -> FRETLESS 1

v:18 -> HARP 1

v:19 -> TIMPANI (percuss, repeat)

v:20 -> HEAVYMETAL

v:21 -> STEEL DRUM (Pecuss, good)

v:22 -> SYN-LEAD 1

v:23 -> VOICES BC

v:24 -> CLAV ENS

v:25 -> LASERSWEEP

v:26 -> TUB ERUPT (Bells)

v:27 -> GRAND PRIX

v:28 -> REFS WHISL

v:29 -> TRAIN (Percuss GOod)

v:30 -> BRASS S H (Synth)

v:31 -> TAKE OFF

#Bank 8

v:0 -> PIANO 2

v:1 -> E.GRAND 1

v:2 -> E.GRAND 2

v:3 -> HONKY TONK

v:4 -> E.PIANO 2

v:5 -> E.PIANO 3

v:6 -> E.PIANO 4

v:7 -> CELESTE

v:8 -> FUNK CLAV

v:9 -> CLAV ENS 2

v:10 -> PERC CLAV

v:11 -> HARPSICH 2

v:12 -> E.ORGAN 2 (Organ)

v:13 -> E.ORGAN 3

v:14 -> 60-S ORGAN (Organ)

v:15 -> PIPES 2

v:16 -> PIPES 3

v:17 -> CALIOPE

v:18 -> ACCORDION

v:19 -> TOY PIANO
 v:20 -> SITAR
 v:21 -> KOTO
 v:22 -> JAZZ GUIT2
 v:23 -> SPANISHGTR
 v:24 -> FOLK GUIT
 v:25 -> LUTE
 v:26 -> BANJO
 v:27 -> CLAS.GUIT
 v:28 -> HARP 2
 v:29 -> E.BASS 2 (Bass)
 v:30 -> FRETLESS 2
 v:31 -> PLUCK BASS (Bass)

#Bank 9

v:0 -> PICCOLO
 v:1 -> FLUTE 2
 v:2 -> OBOE
 v:3 -> CLARINET (Repeat)
 v:4 -> BASSOON
 v:5 -> PAN FLUTE (Winds)
 v:6 -> LEAD BRASS (Synth)
 v:7 -> HORNS
 v:8 -> SOLO TBONE
 v:9 -> BRASS BC
 v:10 -> BRASS 5THS
 v:11 -> SYNTHBRASS (Brass)
 v:12 -> STRG QRT 1
 v:13 -> STRG ENS 2 (Strings, great!)
 v:14 -> VIOLA SECN (Strings, great)
 v:15 -> STRGS LOW (Strings)

v:16 -> HIGH STRGS
 v:17 -> PIZZ STGS
 v:18 -> STG CRSNDO
 v:19 -> STGS 5THS
 v:20 -> BELLS (repeat)
 v:21 -> TUB BELLS (repeat, good)
 v:22 -> RECORDERS
 v:23 -> CHIMES (Bells)
 v:24 -> VOICES
 v:25 -> XYLOPHONE
 v:26 -> COWBELL (Percuss, repeat)
 v:27 -> WOOD BLOCK (Percuss)
 v:28 -> FLEXATONE
 v:29 -> LOG DRUM (Percuss, repeat)
 v:30 -> GLOKENSPL
 v:31 -> VIBE (Bells)

#Bank 10

v:0 -> CLAV-E.PNO
 v:1 -> PERC BRASS
 v:2 -> PRC SYNTH2 (Synth)
 v:3 -> HARPSI-STG
 v:4 -> CHIME-STRG
 v:5 -> HARP-FLUTE
 v:6 -> BELL-FLUTE
 v:7 -> STRG-CHIME (Synth)
 v:8 -> STRG-MARIM (String)
 v:9 -> STRG-PIZZT (String)
 v:10 -> ORCHESTRA
 v:11 -> LEAD GUITR
 v:12 -> PIANO-BRS

v:13 -> BRS-CHIME

v:14 -> B.DRM-SNAR (Percuss, repeat)

v:15 -> E.P-BRS BC (Bass)

v:16 -> ORG-BRS BC (Organ)

v:17 -> CLV-BRS BC

v:18 -> WHISTLES (wind)

v:19 -> FILTER SWP

v:20 -> FUNKY RISE

v:21 -> WILD BOAR

v:22 -> SHIMMER

v:23 -> EVOLUTION

v:24 -> WATER GDN

v:25 -> WASP STING

v:26 -> MULTI NOTE

v:27 -> DESCENT

v:28 -> OCTAVE WAR

v:29 -> ..GOTCHA..

v:30 -> ST.HELENS

v:31 -> EXPLOSION