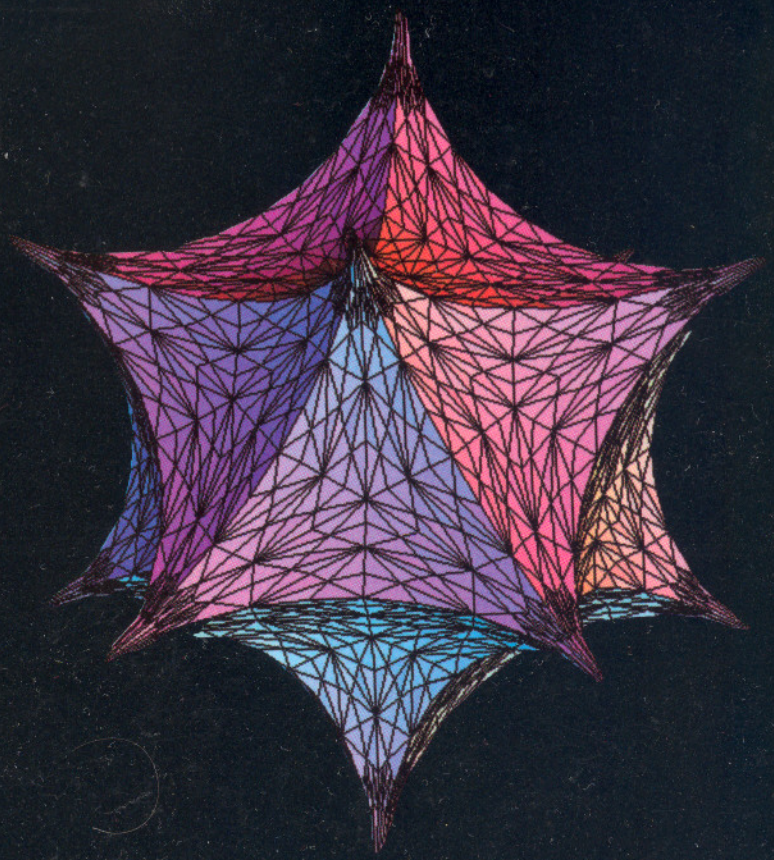
sun microsystems

SunMathematica™

A System for Doing Mathematics by Computer

Installation Manual



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6. Installation Walkthrough

6.1 A Single Sun-3 Workstation

This section shows how you would install *SunMathematica* on a single Sun-3 Workstation that has its own SCSI cartridge tape drive. We assume that the workstation is equipped with the standard 68881 floating point coprocessor.

```
                          su    become superuser
       mkdir /usr/local/math    create the main directory for SunMathematica
         cd /usr/local/math     go to the main SunMathematica directory
tar xvf /dev/rst0 common README sun3.68881
                                read the tape
                 cd common      go to the common subdirectory
```

The first steps.

```
                      hostid    find the hostid for your workstation
```

Finding the hostid.

The hostid should be an 8-digit hexadecimal number, such as `110091cb`.

Now create a password file called `passwd` in the `common` directory. Here is what it should look like, assuming that your workstation is called `ant`. Note that this password file has no relation to the SunOS user password file `/etc/passwd`.

```
ant 110091cb
```

The original form of a typical password file.

Now you must contact Sun Microsystems to get the *SunMathematica* password for your machine. Do not forget to have your purchase order or packing slip for *SunMathematica* at hand when you contact Sun.

The procedure for contacting Sun is given in Section 3.5.

Now edit your password file, to include the *SunMathematica* password you have been given.

```
ant 110091cb 5671-12001
```

The final form of a typical password file.

Do not leave out the dash in the *SunMathematica* password.

Now you are ready to finish the installation procedure.

math.install	run the main installation script

The final step in installing *SunMathematica*.

```
Installing Mathematica ...

Checking Mathematica password file...
Mathematica password file OK.

Mathematica needs to know where its main directory is.
The name of the directory must be given in a form that is recognized
by all the workstations for which this installation is being done.
The default directory that will be used is your current directory:
    /usr/local/math
Enter the name of your main Mathematica directory
 [type return to use /usr/local/math]:

You must specify where you want to put the command files
"math" and "mathremote".  Usually you should put these files
in a bin directory, such as /usr/local/bin.
The default directory that will be used is:
    /usr/local/math

Enter the name of your command directory
 [type return to use the default]: /usr/local/bin

The file /usr/local/bin/math has been created.
The file /usr/local/bin/mathremote has been created.

Installation Done.

You can rerun math.install for other workstations if you need to.
The Mathematica manual page entries are in
    /usr/local/math/man
```

A typical transcript from running `math.install`.

Now you can test out *SunMathematica*. Go to any directory and type `math`. *SunMathematica* should start up.

6.2 A Network of Identical Workstations

If you have a network of identical workstations, the only change you will usually have to make in the installation procedure described in the previous section for a single workstation is to include entries for your other workstations as separate lines in your *SunMathematica* password file.

See the remarks on network installation in Section 3.7, however, for possible complications.

6.3 Different Architectures of Workstations

If you have a network containing several different architectures of workstations, you have to set up several versions of *SunMathematica*.

Section 2.2 lists the available versions of *SunMathematica*. All these versions are included on the standard *SunMathematica* distribution tape.

All you need to do is extract the versions you need from the tape, as described in Section 3.3.

You will usually have to copy the command files `math` and `mathremote` into the different command directories you have for each architecture of workstation.

6.4 More Complicated Cases

If you cannot work out what to do simply by looking at this section, you should read the preceding parts of this document.