

# Docker Layouts and Creating Local Containers

Package	Shibboleth IDP	Grouper	COManage
how containers descend	centos:centos7	centos:centos7	centos:centos7
	tier/centos7base ( <a href="#">git</a> )	tier/centos7base ( <a href="#">git</a> )	tier/centos7base ( <a href="#">git</a> )
	tier/shibboleth_idp ( <a href="#">git</a> )	tier/shibboleth_sp ( <a href="#">git</a> )	tier/shibboleth_sp ( <a href="#">git</a> )
	my/shibboleth_idp ( <a href="#">git</a> )	tier/grouper ( <a href="#">git</a> )	tier/comanage ( <a href="#">git</a> )
		my/grouper ( <a href="#">git</a>   <a href="#">docker-compose</a> )	my/comanage ( <a href="#">git</a>   <a href="#">docker-compose</a> )

Creating a local Dockerfile based on the [TIER appliances](#) to create campus customizations is always possible. One can then build a container and push to a local registry for deployment in a campus environment.

e.g. Create a local Dockerfile:

```
FROM my/grouper

ARG maintainer=$maintainer
ARG imagename=$imagename
ARG version=$version

RUN echo hello world
```

Build the local container:

```
maintainer="my"
imagename="localpackagename"
version="1.0"
docker build --rm -t $maintainer/$imagename --build-arg maintainer=$maintainer --build-arg imagename=$imagename
--build-arg version=$version .
```

Now, run the following command:

```
docker images
```

The container should be in the local repo, named my/localpackagename in this case.

Source code for TIER containers/VMs are located at the following URL: <https://github.internet2.edu/docker>