

nova_ci - Feature #18859

Adding support for checking out svn branches

01/31/2018 03:19 PM - Pengfei Ding

Status:	Feedback	Start date:	01/31/2018
Priority:	Normal	Due date:	
Assignee:	Pengfei Ding	% Done:	50%
Category:		Estimated time:	0.00 hour
Target version:		Spent time:	0.00 hour
Description			
At the moment, the ci test checks out packages from the http://cdcvs.fnal.gov/subversion/novaart.pkgs.svn/tags/ directory for a given svn tag.			
We want to use the CI test for a new branch, so it would be great if the ci test can check out packages from http://cdcvs.fnal.gov/subversion/novaart.pkgs.svn/branches directory too.			
The desired feature would end up like:			
In addition to 'trigger --revisions "novaart.pkgs.svn@S16-03-04' which runs ci tests on the tag "S16-03-14", we want a 'trigger --revisions-branch "novaart.pkgs.svn@S16-03-04"'. It would also be great if the current "--revisions" can be aliased to "--revisions-tag".			

History

#1 - 01/31/2018 03:49 PM - Pengfei Ding

Note, when using branches, the "update-release" command should add "--branch" option.
Examples can be found at

https://cdcvs.fnal.gov/redmine/projects/novaart/wiki/Installing_a_local_copy_of_NOvASoft_and_the_external_products#3-releaseND-Development-or-releaseND_Test

#2 - 01/31/2018 04:19 PM - Vito Di Benedetto

- Status changed from New to Work in progress

#3 - 01/31/2018 05:48 PM - Vito Di Benedetto

- % Done changed from 0 to 50

The checkout CI phase in nova_ci workflow "NOvA_CI_SRT" has been updated with support to test novaart.pkgs.svn branches.

To do that you need to use the trigger "--revisions" option.
A basic example to trigger a NOvA CI build to test the branch "S16-03-14" is

```
trigger --revisions "novaart.pkgs.svn@S16-03-04"
```

The current implementation assumes that whenever you uses the "--revisions" option, you are requiring to test a branch.
This excludes the possibility to test tags. But I think the code used to create a tag has already been tested previously.

Please, trigger some test NOvA CI build to check if this implementation works as expected.

#4 - 01/31/2018 06:08 PM - Pengfei Ding

Thanks Vito. I've triggered the test #4329 with
trigger --build-delay 0 --ci-tests "ci_raw2root_fd_t00_regression_test_novasoft" --revisions "novaart.pkgs.svn@art2root6-integration-trunk"
Triggering CI build

It does check out the novaart packages from a branch.

https://buildmaster.fnal.gov/job/nova_ci/4329/

Build #4322 was the one triggered with the same command, but before the "branch" feature was added. So looking at the console output, there were no novaart packages checked out.

https://buildmaster.fnal.gov/job/nova_ci/4322/label_exp=SLF6,label_exp2=swarm/console

#5 - 01/31/2018 06:10 PM - Pengfei Ding

I took it back. I still saw it was trying to checkout from the tags subdirectory.

svn: URL 'http://cdvcs.fnal.gov/subversion/novaart.pkgs.svn/tags/art2root6-integration-trunk/SRT_NOVA' doesn't exist

Was looking at the build #4322, instead of #4329.

#6 - 01/31/2018 06:26 PM - Vito Di Benedetto

I think there is still something to update in the "build" CI phase.
Maybe the "source setup/setup_nova.sh" needs a different set of options for a branch?

#7 - 01/31/2018 06:46 PM - Pengfei Ding

Yes. I think It is trying to do a srt setup and set the SRT_PUBLIC_CONTEXT to
/cvmfs/nova.opensciencegrid.org/novasoft/slf6/novasoft/releases/\$BRANCH_NAME

For tagged release, we always have one release with the same tag name under /cvmfs/nova.opensciencegrid.org/novasoft/slf6/novasoft/releases/ ;
but we do not have that there for branches.

If the srt_setup was successful, it should have SRT_PUBLIC_CONTEXT set and find the novasoft_build from:

`\${SRT_PUBLIC_CONTEXT}/SRT_NOVA/scripts/novasoft_build

#8 - 01/31/2018 06:50 PM - Pengfei Ding

We need to create a second "build" step, which, instead of calling novasoft_build from `\${SRT_PUBLIC_CONTEXT}/SRT_NOVA/scripts/, call it from
/cvmfs/nova.opensciencegrid.org/novasoft/slf6/novasoft/releases/development/SRT_NOVA/scripts/novasoft_build

#9 - 02/01/2018 10:13 AM - Vito Di Benedetto

Currently for the build setup step the CI runs the command below:

```
source ${WORKSPACE}/setup/setup_nova.sh -r ${moduleVers:-development} -b "${NOVA_QUALS}" -6 "${WORKSPACE}" -e  
"/cvmfs/nova.opensciencegrid.org/externals:/grid/fermiapp/products/common/db:/grid/fermiapp/products/nova/externals"
```

where, in the case of the "art2root6-integration-trunk" branch, "\${moduleVers:-development}" is expanded to "art2root6-integration-trunk" and
`\${NOVA_QUALS}` is expanded to "maxopt"

Then for the actual build, the CI runs the command:

```
`${SRT_PUBLIC_CONTEXT}/SRT_NOVA/scripts/novasoft_build -rel ${moduleVers:-development} -p ${N} -failonerror
```

where, again, `\${moduleVers:-development}` in this case is expanded to "art2root6-integration-trunk"

Other than replace, as you suggested, `\${SRT_PUBLIC_CONTEXT}/SRT_NOVA/scripts/novasoft_build` with
"/cvmfs/nova.opensciencegrid.org/novasoft/slf6/novasoft/releases/development/SRT_NOVA/scripts/novasoft_build", is there anything else to be
updated?

I'm running the novaart build procedure interactively to make sure that all the steps are working properly.

#10 - 02/06/2018 11:49 AM - Vito Di Benedetto

- Status changed from Work in progress to Feedback
- Target version set to v1_6_0_RC

In order to get the "build" CI phase to work, Pengfei pointed out that it is needed to create an empty base release with the required branch name and
push to cvmfs.

#11 - 02/19/2018 03:05 PM - Vito Di Benedetto

- Target version changed from v1_6_0_RC to v1_6_0

#12 - 03/20/2018 08:01 PM - Vito Di Benedetto

- Assignee changed from Vito Di Benedetto to Pengfei Ding
- Target version deleted (v1_6_0)

Assigned the ticket to Pengfei for his part of the work to create the empty base release with the required branch name and push it to cvmfs.