

Intro Manual for STAR Juniors

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1 Introduction

Welcome to STAR!, this manual is intended to help STAR juniors who have just entered the collaboration. The manual has various topics and materials needed for you to start your analysis and to know your way around RACF.

2 RACF

Once you have obtained your life number and other credentials, you can use these credentials to login onto RACF. To obtain these credentials you can visit this link and follow the steps accordingly (<https://drupal.star.bnl.gov/STAR/comp/sofi/facility-access/general-access>).

The basic commands needed to login to an interactive session on RACF:

```
% ssh -AX xxx@sssh.sdcc.bnl.gov
% rterm -i
```

xxx - is where your username is supposed to be.

Upon ssh you will be asked a password, this is the credentials of the local pc you are using.

Upon rterm you have to type in your RACF password.

2.1 Running your analysis

For running your analysis, you have to setup some preliminary files for successful running of your script. Here are a few useful tutorials:

- Set up your environment on RACF: https://drupal.star.bnl.gov/STAR/system/files/STAR_soft_BNL_LK_2015_6_1.pdf
- Data analysis: https://drupal.star.bnl.gov/STAR/system/files/RMa_ColMetg_Junior.pdf

An important point to remember is that the interactive session should only be used to test your macros. You have to use the scheduler to submit jobs to the farm where you will get plenty of space and computation power.

- Scheduler tutorial: <https://www.star.bnl.gov/public/comp/Grid/scheduler/manual.htm>
- Data availability: <https://www.star.bnl.gov/public/comp/prod/localdata/DDpicoize.html>

3 Publishing Analysis

STAR Papers are documented in detail with their analysis notes, which you can find here: <https://drupal.star.bnl.gov/STAR/starnotes>.

STAR stores their published analyses and it is very thoroughly documented. So if you want to know how some of the macros were written from the previously published STAR paper, you can find it here based on its PSN number (analysis note number): <https://www.star.bnl.gov/cgi-bin/protected/viewvc.cgi/cvsroot/offline/paper/>

Here are resources that you may find useful for publishing your analyses:

- List of God Parent Committees: <https://www.star.bnl.gov/protected/common/GPCs/gpc-committees.xml>
- Publication steps: https://drupal.star.bnl.gov/STAR/system/files/20220916_PACreport.pdf
- Author tools: <https://www.star.bnl.gov/central/collaboration/authors/>

4 Physics Working Groups

Currently STAR has 5 PWGs, these working groups have people working on common analyses and it's a great platform for you to ask questions and seek advice/help.

You can find the link to each PWG and their weekly meeting links and their previous agendas here : <https://drupal.star.bnl.gov/STAR/pwg> and <https://drupal.star.bnl.gov/STAR/event>

5 Mattermost channels

Our Collaborations has many Mattermost channels where you could ask doubts and there will be experts around to help you.

- Juniors: <https://chat.sdcc.bnl.gov/star/channels/star-juniors>
- Software and infrastructure: <https://chat.sdcc.bnl.gov/star/channels/star-software-and-infrastructure>
- Town square: <https://chat.sdcc.bnl.gov/star/channels/town-square>
- Job running: <https://chat.sdcc.bnl.gov/star/channels/scheduler>
- Data production: <https://chat.sdcc.bnl.gov/star/channels/star-production>
- HEPData uploading: <https://chat.sdcc.bnl.gov/star/channels/hepdata>

6 STAR Collaboration Meetings

The Collaboration meetings happen twice a year and the meeting starts off with Junior days where a lot of resources and materials are discussed and made available to the juniors.

The link to past junior days:

<https://drupal.star.bnl.gov/STAR/juniors/past-juniors-days>

The link to STAR Junior Education Materials:

<https://drupal.star.bnl.gov/STAR/juniors/educational-materials>

7 STAR Mailing Lists

You can subscribe to the mailing lists to get updates on recent events. Here is a link to all the mailing lists STAR has, you can subscribe to the ones you are interested in: <https://lists.bnl.gov/mailman/listinfo>