Cover Letter

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How did you find out about our mentorship program?

I found out about the LFX mentorship program through one of my friends. On exploring the site, I saw the program listed under open applications.

Why are you interested in this program?

While going through the project description and the issue on the repository, I read through many comments, and I got to understand how crucial this feature will be for the community and how its implementation will result in better automation and integration capabilities. This is a big motivation for me, as this project is more ambitious and will provide an excellent learning opportunity. In addition, I'll learn more about Harbor and the cloud-native ecosystems while making something that others will use.

What experience and knowledge/skills do you have that are applicable to this program?

I have been working on open source for almost two years. I did my **Google Summer of Code (GSoC) under Wagtail** in 2022. During the project, I applied shared templates across the whole CMS, worked with the Python backend, modified existing components and functions, created new ones, and added components to the Wagtail pattern library for smoother testing. I also did some heavy unit testing with Jest and Python. I'm also serving as an **Outreachy mentor** for Wagtail, where we are introducing Stimulus.js into Wagtail. I saw the internship process through the mentor's side and learnt how to work collaboratively and how important communication is for a successful project. Besides Wagtail, I contribute to **Specter-Desktop**(Crypto Wallet), **Purr Data** and **CNCF-Vitess**.

My involvement with Harbor

I've been involved with Harbor for some time. I went through the documentation, attended Harbor's bi-weekly community meeting, got to know the whole team, introduced myself and actively contributed to Harbor's website. My contributions-

- Fixed configure user settings link
- Fixed table size bug
- Replaced disable with deactivate
- Fixed configure user settings link for main
- Removed .0 from doc version drop down
- Fixed redirection logic
- Replaced disable with deactivate for latest docs

I've done some personal projects with Go. Still, working on a significant project like this will help me better understand things, as learning by applying is my way of getting familiar with any technology. I am willing to work hard and give my best to make this a successful project.

What do you hope to get out of this mentorship experience?

By the end of the mentorship, I want to I aim to get more proficient with Go and have a more profound knowledge of Harbor. Additionally, I am looking forward to being comfortable working with docker. However, the most valuable thing I hope to get out of this mentorship is **guidance** and **experience,** which will help me throughout my life.

Project Proposal

Title: Enhancing Harbor with Improved Robot Account and API Permissions
Description: This project aims to improve Harbor's Robot Account functionality and API permissions to provide users with better automation and integration capabilities. This project will involve implementing additional API permissions for robot accounts, improving the UI for managing robot accounts, and ensuring that robot accounts have access to all necessary APIs, including copy artifact and listing tags.
Implementation:

- To add support for more fine-grained permission management, we can use Harbor's current RBAC system to add custom roles and permissions for robot accounts. This can be done by adding new API endpoints and UI features to manage these roles and permissions.
- To add support for the copy artifact API, we can implement a new permission that allows robot accounts to access this endpoint.
- To improve tag listing and reading functionality, we can add a new permission that allows robot accounts to list and read tags. This can be done by updating the existing RBAC system and the relevant API endpoints to check for this permission.

My Plan:

- Research and familiarize me with Harbor's current robot account and API permission system.
- Review and analyze previous user feedback and issues related to robot accounts and API permissions.
- Implement UI improvements for managing robot accounts, such as adding support for more fine-grained permission management.
- Add missing API permissions for robot accounts to improve automation capabilities.
- Begin testing and debugging changes.
- Evaluate progress and adjust the plan as necessary.
- Conduct thorough documentation of changes and new features.
- Prepare for submission and review.