

# Open Horizon - Stage 2 - 2024-03-20

Completed by: [Joe Pearson](#), IBM

Submitted to TAC Mail List: TBD

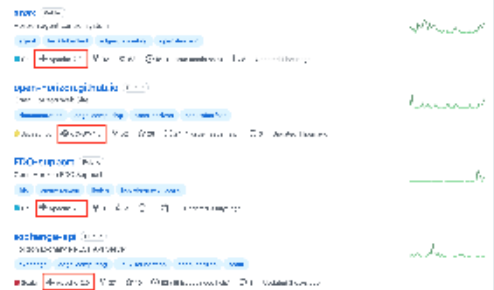
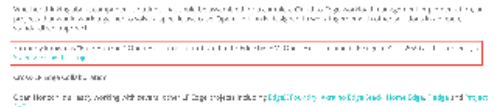

Presented on TAC Weekly Call: TBD



Below is a self-assessment submitted by TSC Chair/Maintainers of the Project. Comments/questions/feedback is welcome either a) in the Comments at the bottom of the page or b) during the TAC call when information is presented

## stage 1: At Large Projects

Stage 2 and Stage 3 Projects also requested to complete this section, as PLD acceptance criteria requires meeting current as well as prior stage requirements

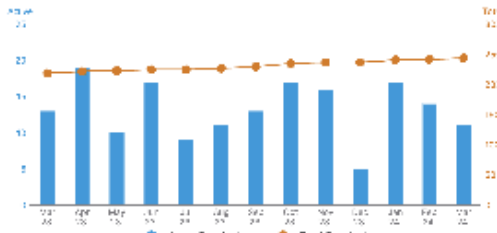
Stage 1 Criteria (from the <a href="#">PLD</a> )	Meets / Needs Improvement / Missing / Not Applicable	Supporting Data (if needed, include links to specific examples)
2 TAC Sponsors, if identified (Sponsors help mentor projects) - See full definition on <a href="#">Project Stages: Definitions and Expectations</a>	Meets	Joe Pearson, IBM Randy Templeton, Intel Erik Nordmark, Zededa Anil Vishnoi, Red Hat
The typical IP Policy for Projects under the LF Edge Foundation is Apache 2.0 for Code Contributions, Developer Certificate of Origin (DCO) for new inbound contributions, and Creative Commons Attribution 4.0 International License for Documentation. Projects under outside licenses may still submit for consideration, subject to review/approval of the TAC and Board.	Meets	 Code repositories use Apache 2.0 Documentation uses CC-by-4.0
Upon acceptance, At Large projects must list their status prominently on website /readme	Meets	On <a href="https://www.lfedge.org/projects/openhorizon/">https://www.lfedge.org/projects/openhorizon/</a>  On <a href="https://github.com/open-horizon">https://github.com/open-horizon</a>  Marketing website not yet launched, but will reference.

Stage 1 Projects, please skip to **Additional Information Requested from All Projects**

## Stage 2: Growth Stage

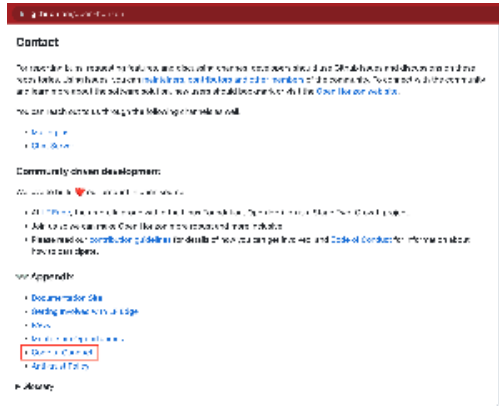
Stage 3 Projects also requested to complete this section

Stage 2 Criteria (from the <a href="#">PLD</a> )	Meets / Needs Improvement / Missing / Not Applicable	Supporting Data (if needed, include links to specific examples)
<p>Development of a growth plan (to include both roadmap of projected feature sets as well as overall <a href="#">community</a> growth/project maturity), to be done in conjunction with their project mentor(s) at the TAC.</p> <p>Demonstrate that the current level of community participation is sufficient to meet the goals outlined in the growth plan.</p>	Meets	<p>Features are released iteratively as testable units are completed. Agent releases happen every Thursday.</p> <p>Upcoming work (<a href="#">Feature Requests</a>):</p> <ul style="list-style-type: none"> <li>• <a href="#">Hashicorp Vault to OpenBao conversion</a> (with OpenBao project)</li> <li>• Updating FDO integration (ongoing with FDO project)</li> <li>• <a href="#">Realtime Workload Metrics</a> (with EdgeLake project)</li> <li>• <a href="#">Workload Runtime Security</a> (with KubeArmor project)</li> <li>• WASM workload support (with atym.io)</li> </ul> <p>Project maturity:</p> <ul style="list-style-type: none"> <li>• <del>All WG repos will list MAINTAINERS and keep updated</del> - completed</li> <li>• Add project Partners (to reduce IBM TSC votes below 33%)</li> <li>• Expand ecosystem with OSS partnerships</li> <li>• Add commercial usage: IBM Hybrid Cloud Mesh is the third</li> </ul> <p>Community growth:</p> <ul style="list-style-type: none"> <li>• Continue to work with universities <ul style="list-style-type: none"> <li>◦ Added Georgia Tech's summer internship program last month</li> <li>◦ Working with <a href="#">ZHAW</a> on <a href="#">Nephele</a></li> </ul> </li> <li>• Support developers by turning ONE Summit demos into evergreen examples that anyone can run and learn from</li> <li>• Launch marketing web site with information on adopters and demos, better LF Edge Sandbox integration</li> </ul>
Document that it is being used in POCs.	Meets	<ul style="list-style-type: none"> <li>• Application-centric networking - IBM Hybrid Cloud Mesh, <a href="#">Skupper demo at ONE Summit</a> TBD</li> <li>• Nephele <a href="#">robotics search-and-rescue</a> use case</li> <li>• above feature requests</li> </ul>

Demonstrate a substantial ongoing flow of commits and merged contributions.	Meets	<div>Insights Link - opened a Jira ticket</div> <div><div><div><div>Contributor Leaderboard ⓘ</div><div>Activities are down <span>📉</span> by 62.91% vs. the previous time period.</div><div>Metric<div>Activities</div></div><table><thead><tr><th>Rank</th><th>Contributor</th><th>Activities</th><th>Change</th><th>Total</th></tr></thead><tbody><tr><td>1</td><td> LillyZhang</td><td>448</td><td>+41</td><td>26.56%</td></tr><tr><td>2</td><td> joewxboy</td><td>189</td><td>-286</td><td>11.2%</td></tr><tr><td>3</td><td> bencourliss</td><td>188</td><td>+42</td><td>11.14%</td></tr><tr><td>4</td><td> naphelps</td><td>176</td><td>+1</td><td>10.43%</td></tr><tr><td>5</td><td> diarson04</td><td>154</td><td>-169</td><td>9.13%</td></tr><tr><td>6</td><td> MaxMcAdam</td><td>96</td><td>-57</td><td>5.69%</td></tr><tr><td>7</td><td> JohnWalicki</td><td>94</td><td>-1.05K</td><td>5.57%</td></tr><tr><td>8</td><td> blakep7</td><td>70</td><td>+70</td><td>4.15%</td></tr><tr><td>9</td><td> linggao</td><td>54</td><td>-826</td><td>3.2%</td></tr><tr><td>10</td><td> t-fine</td><td>28</td><td>-74</td><td>1.66%</td></tr><tr><td>11</td><td> Le Zhang</td><td>24</td><td>+24</td><td>1.42%</td></tr></tbody></table></div><div><div>Commits: 55 <span>📉</span></div><div>Issues: 84 <span>📉</span></div><div>Pull Requests: 290 <span>📉</span></div><div>Reviews: 37 <span>📉</span></div><div>Stars: 20 <span>📉</span></div></div><div><div><div>Contributors ⓘ</div><div>Active Contributors decreased by 23% <span>📉</span> vs. the previous time period.</div></div></div><div><div><div>Contributor Dependency ⓘ</div><div>52% of your code activities were performed by 3 people.</div><div>Metric<div>Activities</div></div><div><div>Top 3 Contributors52%</div><div>Next 61 Contributors48%</div></div><div><div>Top 3</div><div>Next 61</div></div><table><thead><tr><th>Rank</th><th>Contributor</th><th>Activities</th><th>Change</th><th>Total</th></tr></thead><tbody><tr><td>1</td><td> LillyZhang</td><td>602</td><td>+77</td><td>28.9%</td></tr><tr><td>2</td><td> naphelps</td><td>277</td><td>+41</td><td>13.3%</td></tr><tr><td>3</td><td> joewxboy</td><td>201</td><td>-316</td><td>9.65%</td></tr></tbody></table><div>Showing 3 of 3</div></div></div><div><div><div>Organization Leaderboard ⓘ</div><div>Activities are down <span>📉</span> by 61.85% vs. the previous time period.</div><div>Metric<div>Activities</div></div><table><thead><tr><th>Rank</th><th>Organization</th><th>Activities</th><th>Change</th><th>Total</th></tr></thead><tbody><tr><td>1</td><td> International Business Machines Corporation</td><td>1.21K</td><td>-1.75K</td><td>73.42%</td></tr><tr><td>2</td><td> The Linux Foundation</td><td>96</td><td>-20</td><td>5.83%</td></tr><tr><td>3</td><td> Atw</td><td>82</td><td>-42</td><td>4.98%</td></tr><tr><td>4</td><td> General Dynamics Ordnance and Tactical Systems</td><td>55</td><td>+55</td><td>3.34%</td></tr><tr><td>5</td><td> D4 Solutions</td><td>55</td><td>+4</td><td>3.34%</td></tr><tr><td>6</td><td> pcitc</td><td>54</td><td>-826</td><td>3.28%</td></tr><tr><td>7</td><td> San Diego State University</td><td>35</td><td>+35</td><td>2.12%</td></tr><tr><td>8</td><td> GitHub</td><td>23</td><td>+13</td><td>1.4%</td></tr><tr><td>9</td><td> arjunsingh.tech</td><td>8</td><td>+8</td><td>0.49%</td></tr></tbody></table></div><div><div><div>Organization Dependency ⓘ</div><div>69% of your code activities were performed by 1 organization.</div><div>Metric<div>Activities</div></div><div><div>Top 1 Organizations69%</div><div>Next 21 Organizations31%</div></div><div><div>Top 1</div><div>Next 21</div></div><table><thead><tr><th>Rank</th><th>Organization</th><th>Activities</th><th>Change</th><th>Total</th></tr></thead><tbody><tr><td>1</td><td> International Business Machines Corporation</td><td>1.4K</td><td>-2.2K</td><td>68.93%</td></tr></tbody></table><div>Showing 1 of 1</div></div></div></div></div></div>	Rank	Contributor	Activities	Change	Total	1	LillyZhang	448	+41	26.56%	2	joewxboy	189	-286	11.2%	3	bencourliss	188	+42	11.14%	4	naphelps	176	+1	10.43%	5	diarson04	154	-169	9.13%	6	MaxMcAdam	96	-57	5.69%	7	JohnWalicki	94	-1.05K	5.57%	8	blakep7	70	+70	4.15%	9	linggao	54	-826	3.2%	10	t-fine	28	-74	1.66%	11	Le Zhang	24	+24	1.42%	Rank	Contributor	Activities	Change	Total	1	LillyZhang	602	+77	28.9%	2	naphelps	277	+41	13.3%	3	joewxboy	201	-316	9.65%	Rank	Organization	Activities	Change	Total	1	International Business Machines Corporation	1.21K	-1.75K	73.42%	2	The Linux Foundation	96	-20	5.83%	3	Atw	82	-42	4.98%	4	General Dynamics Ordnance and Tactical Systems	55	+55	3.34%	5	D4 Solutions	55	+4	3.34%	6	pcitc	54	-826	3.28%	7	San Diego State University	35	+35	2.12%	8	GitHub	23	+13	1.4%	9	arjunsingh.tech	8	+8	0.49%	Rank	Organization	Activities	Change	Total	1	International Business Machines Corporation	1.4K	-2.2K	68.93%
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Demonstrate evidence of, or a plan for, interoperability, compatibility or extension to other LF Edge Projects. Examples may include demonstrating modularity (ability to swap in components between projects).	Meets	<div><ul style="list-style-type: none"><li>Hashicorp Vault to OpenBao conversion (with OpenBao project)</li><li>Device onboarding to EVE (demo with FDO, Project EVE, and LF Edge Sandbox)</li><li>Realtime Workload Metrics (with EdgeLake project)</li><li>Workload Runtime Security (with CNCF KubeArmor project)</li><li>Application-centric connectivity (demo with Skupper, LF Networking)</li></ul></div>																																																																																																																																												

Stage 2 Projects, please skip to **Additional Information Requested from All Projects**

## Stage 3: Impact Stage

Criteria	Meets / Needs Improvement / Missing / Not Applicable	Supporting Data (if needed, include links to specific examples)
Have a defined governing body of at least 5 or more members (owners and core maintainers).	Needs Improvement	<p>Link to <a href="#">TSC page on wiki</a>. Current composition is:</p> <ul style="list-style-type: none"> <li>IBM - 5 (71%)</li> <li>AccuKnox - 1 (14%)</li> <li>mimik Technologies - 1 (14%)</li> </ul> <p>Actively working to expand TSC voting membership outside of IBM.</p>
Have a documented and publicly accessible description of the project's governance, decision-making, and release processes.  Explicitly define a project governance and committer process. This is preferably laid out in a <a href="#">GOVERNANCE.md</a> file and references a <a href="#">CONTRIBUTING.md</a> and <a href="#">OWNERS.md</a> file showing the current and emeritus committers.	Meets	<ul style="list-style-type: none"> <li><a href="#">Governance</a> - high level description of goals</li> <li><a href="#">Community</a> - organizational structure, roles, process</li> <li><a href="#">Contributions</a> - feature requests &amp; lifecycle process</li> <li>Release - feature releases &amp; roadmap <a href="#">see Growth Plan above</a></li> </ul>
Have a healthy number of committers from at least two organizations. A committer is defined as someone with the commit bit; i.e., someone who can accept contributions to some or all of the project.	Meets	<p><a href="#">See Insights links above.</a></p> <p>NOTE: Current Insights organization report not accurate.</p>
Demonstrate evidence of interoperability, compatibility or extension to other LF Edge Projects. Examples may include demonstrating modularity (ability to swap in components between projects).	Meets	<a href="#">See interoperability section above.</a>
Adopt the Foundation Code of Conduct.	Meets	
Have a public list of project adopters for at least the primary repo (e.g., <a href="#">ADOPTERS.md</a> or logos on the project website).	Meets	<p>Added Anylog/EdgeLake, atym.io, AgriLife (Texas A&amp;M), ZHAW/Nephele</p> <p>Mainsail, Turnium, IBM, Intel, Samsung, DLR (Rhineland-Palatinate), AgriRegio Projekt, AccuKnox, mimik, Scale Computing, Boston Dynamics, Promare, Intensivate, expeer</p>

## Additional Information Requested from All Projects

Additional Information Requested from All Projects	Supporting Data (if needed, include links to specific examples)
Intention for the upcoming year (Remain at current stage OR advance towards the next Stage)	We intend to advance to Stage Three when the project <i>and our TAC Sponsors</i> feel we're ready. At this point, the largest sticking point is increasing non-IBM contributions. Open Horizon should not be a single-source open-source project.
Include a link to your project's <a href="#">LFX Insights</a> page. We will be looking for signs of consistent or increasing contribution activity. Please feel free to add commentary to add color to the numbers and graphs we will see on Insights.	<a href="#">Insights Link</a>
How many maintainers do you have, and which organizations are they from? (Feel free to link to an existing MAINTAINERS file if appropriate.)	<p>We feature a MAINTAINERS file in each repo, ex:</p> <ul style="list-style-type: none"> <li><a href="#">KubeArmor-Integration</a> - AccuKnox</li> <li><a href="#">Documentation</a> - IBM</li> <li><a href="#">FDO Support</a> - IBM</li> <li><a href="#">Grafana</a> and <a href="#">EdgeLake</a> - Anylog</li> <li>Not including OpenBao, since it is exiting incubation.</li> </ul>

What do you know about adoption, and how has this changed since your last review / since you joined the current Stage? If you can list companies that are end users of your project, please do so. (Feel free to link to an existing ADOPTERS file if appropriate.)	<p>The most recent adoptions are:</p> <ul style="list-style-type: none"> <li>Anylog contributing EdgeLake and working with Open Horizon on Realtime Metrics demo</li> <li>Nephele at ZHAW using Open Horizon for their search-and-rescue mapping service</li> <li>IBM embedding Open Horizon into their <a href="#">Hybrid Cloud Mesh product</a> to dynamically deploy and move L7 Skupper/RHSI gateways to <a href="#">maintain application connectivity</a></li> <li>Texas A&amp;M's AgriLife using Open Horizon for soil moisture research and data collection</li> <li>Intensivate building lab to demo their RISC-V ISA SoC with ~100 units with application deployment managed by Open Horizon</li> </ul>
How has the project performed against its goals since the last review? (We won't penalize you if your goals changed for good reasons.)	<p>Previous Goals:</p> <ul style="list-style-type: none"> <li>Bring two new members to LF Edge <b>Referred Orange, and brought OpenBao, EdgeLake to LF Edge</b></li> <li>Establish ties with at least one university <b>Added Texas A&amp;M, GaTech</b></li> </ul>
What are the current goals of the project? For example, are you working on major new features? Or are you concentrating on adoption or documentation?	<b>See the Stage Two Growth Plan above.</b>
How can LF Edge help you achieve your upcoming goals?	We need some assistance with fundraising so we can offer LFX Mentorships and run hackathon events.
Do you think that your project meets the criteria for the next Stage?	<b>Not quite yet. We need to diversify our TSC company representation.</b>
Please summarize Outreach Activities in which the Project has participated in (e.g. Participation in conferences, seminars, speaking engagements, meetups, etc.)	
Are you leveraging the <a href="#">Technical Project Getting Started Checklist</a> ? If yes, please provide link (if publicly available).	No
Please review, and update if needed, your Project entry on the <a href="#">Existing Project Taxonomy</a> page, modifying the Last Updated / Reviewed date in the header.	No changes needed.
Please share a LFX security report for your project in the last 30 days	<a href="#">blocked URL</a>  <a href="#">SECURITY.md</a>  <a href="#">LFX Security</a> - not functioning