**

INAF - LBT CALL FOR AO PROGRAMS

Period Sept. 2021 - July 2022

Deadline: June 18th, 2021, 24pm CEST

SEND THIS FORM TO LBT-ITALIA@INAF.IT

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| **1. Title** |
|  |
| **2. Abstract** |
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| --- |
| **3. Number of requested hours:** |

|  |  |
| --- | --- |
| **4. Principal investigator** | **5. Co-investigators (name and institution)** |
| Name: |  |  |
| Institute: |  |
| Address: |  |
| e-mail: |  |
| Phone: |  |

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| **4. Description of the programme (2 pages + ≤1 page for references, tables and figures)** |
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| **5. Observational strategy and justification of instrumental setup and of requested time (net exposition time WITHOUT overheads), including night time calibration.** |
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| **6. Strategy and needs for calibration.** *e.g. Are PSF stars required? If PSF stars are required when will they be observed relative to the science target. Will the AO loop be closing on the target or an off-axis guide source. If the latter, what is the required performance on the target (anisoplanatism).* |
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**7. AO Targets and references**

Copy&paste the following table for each target

**(max 5 targets and 8hrs total exp time)**.

|  |  |  |
| --- | --- | --- |
| **Target Name** |  |  |
| **AR** | **00:00:00.00** | **DEC** | **00:00:00.00** |  |
| **Exp Time [min]** |  | **Type (resolved/ unresolved)** |  |  |
| **Reference Name** |  | **Ang. Sep. [arcsec]** |  |
| **AR** | **00:00:00.00** | **DEC** | **00:00:00.00** |  |
| **Mag.****(Vega R or I)** |  | **Type (Stellar or extended** |  |  |
| **Spectral Type,****or Color** |  | **if extended specify obj size and type [arcsec]** | *e. g. Multiple star, AGN, satellite,...**separated 0.4asec* |  |
| **Minimal AO Performances (one requirement only) \*** |
| **PSF FWHM [mas]** |  | **𝝺 [𝝁m]** |  |
| **Strehl ratio** |  | **𝝺 [𝝁m]** |  |
| **PSF contrast** |  | **𝝺 [𝝁m]**  |  |
|  | **Distance from peak [mas]** |  |

***\**** *Here MUST be reported the minimal performance required to achieve the science goal identified in the proposal justification. Please use the* [*SOUL SR-calculator*](http://adopt.arcetri.astro.it/strehl.html) *in order to check if the performances are achievable with the selected AO reference. See section 3 of* [*SOUL-T06 (Performance DOC)*](http://soul.arcetri.astro.it/wp-content/uploads/2020/09/SOUL-T06_SOUL-LUCI1_performance_V1.0_20200918.pdf) *for the full set of tools.*

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| **8. Report about previous use of LBT time and publications.** |
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| **8a. If this proposal is a part of a PhD thesis, write here the name of the student, the thesis title and briefly describe the relevance of these observations for the thesis goals.** |
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| **8b. Is this, or a similar application submitted to other time allocation committees (e.g. ESO, TNG-CAT, ITP)? If yes, please specify which and explain if and why the proposals should be considered complementary.** |
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