United States securities and exchange commission logo

August 20, 2020

Leen Kawas, Ph.D.
Chief Executive Officer
Athira Pharma, Inc.
4000 Mason Road, Suite 300
Seattle, WA 98195

Re: Athira Pharma, Inc.
Draft Registration Statement on Form S-1
Submitted July 24, 2020
CIK No. 0001620463

Dear Dr. Kawas:

We have reviewed your draft registration statement and have the following comments. In some of our comments, we may ask you to provide us with information so we may better understand your disclosure.

Please respond to this letter by providing the requested information and either submitting an amended draft registration statement or publicly filing your registration statement on EDGAR. If you do not believe our comments apply to your facts and circumstances or do not believe an amendment is appropriate, please tell us why in your response.

After reviewing the information you provide in response to these comments and your amended draft registration statement or filed registration statement, we may have additional comments.

Draft Registration Statement on Form S-1

Prospectus Summary
Overview, page 1

1. We note statements throughout the prospectus that imply efficacy, such as "[n]onclinical studies and Phase 1 clinical trials with ATH-1017 demonstrated improvements in brain network activity indicating positive effects on brain function," "multiple dosing of ATH-1017 significantly improved brain activity" in AD subjects, ATH-1017 "normalized the P300 latency of AD subjects in a Phase 1b clinical trial," "data indicate ATH-1017 treatment has recovered disruptions to brain function and network connectivity, likely through several components of the mechanism, including NMDA receptor modulation, increased connectivity through recovery of synaptic density, and overall improvement in neuronal health and function," and a large magnitude improvement in P300 latency that was observed for ATH-1017 is "expected to produce a correlated cognitive improvement." These are just examples. Please revise your disclosure throughout your prospectus to revise these and similar statements to eliminate

conclusions or predictions
that your product candidates are or will be effective as
determinations of efficacy are
solely within the authority of the FDA. You may provide a summary of
the objective data
from your trials in the Business section where full and proper context
can be provided
without including conclusions related to efficacy.
2. We note your disclosure in this section and in the Business section
that you plan to initiate
a "pivotal" Phase 2/3 clinical trial for ATH-1017, LIFT-AD. We also
note your statement
on page 129 that LIFT-AD will need to achieve a statistically
significant improvement
separately on both the ADAS-Cog-11 and ADCS-CGIC in order to be
considered a
pivotal trial supportive of FDA approval for mild to moderate AD.
Please revise the
disclosure in these sections to make it clear that even if you receive
positive data from
LIFT-AD, you cannot be certain that the FDA or other regulators will
find such data
sufficient for approval of ATH-1017 or will not require you to conduct
additional trials.
Please also expand your disclosure to briefly explain what ADAS-cog,
ADAS-cog-11 and
ADCS-CGIC stand for the first time that each term is used in the
prospectus.
Our Pipeline and ATH Platform, page 3

3. We note that you have included in your pipeline table ATH-1019,
ATH-1018 and ATH-
Discovery, all of which are in the discovery phase. Given the
early-stage development of
these programs, please explain why each program is sufficiently
material to your business
to warrant inclusion in your pipeline table. Please also remove the
shaded portions of the
lines in your pipeline table so that your pipeline table accurately
reflects the current stage
of development for each indication for ATH-1017 and remove the second
line for the AD
indication. Please clarify in footnote 3 whether you have already
filed an IND for ATH-
1017 for the treatment of PDD. Given that you have not yet initiated
Phase 3 clinical trials
for any of your product candidates, please also revise your statement
that you are a "late"
clinical-stage biopharmaceutical company throughout the prospectus.
Our Strategy, page 5

4. We note your disclosure here and in the Business section that your
strategy is to "rapidly
advance" ATH-1017 through clinical development for AD and to initiate
two clinical
trials for AD by the end of 2020 in order to "accelerate [y]our
development timelines."
Please revise this disclosure to remove any implication that you will
be successful in
commercializing your product candidates in a rapid or accelerated
manner as such
statements are speculative. In this regard, we note your disclosure
that your product
candidates are based on new approaches and novel technology, which
makes it difficult to
predict the time and cost of product candidate development and the
regulatory approval
process.

Implications of being an emerging growth company, page 10

5. Please supplementally provide us with copies of all written
communications, as defined in

Rule 405 under the Securities Act, that you, or anyone authorized to do so on your behalf,
present to potential investors in reliance on Section 5(d) of the Securities Act, whether or
not they retain copies of the communications.

Risk Factors

Our development of ATH-1017 may never lead to a marketable product, page 21

6. We note your disclosure that you are developing ATH-1017 as a "first-in-class" small
molecule aimed at restoring neuronal health. This term suggests that the product candidate
is effective and likely to be approved. Accordingly, please delete this reference.

Our approach to targeting brain growth factors through the use of small molecules is based on a
novel therapeutic approach, page 22

7. We note your disclosure here that data from certain subjects in your Phase 1a and 1b
clinical trials were not obtained due to problems encountered with the placement of the
EEG electrodes. Please revise your discussion of these trials throughout the prospectus to
disclose this and to state, if true, that your trial descriptions are not representative of all
trial participants. Please also disclose how many subjects were impacted and in which
patient populations.

Market, Industry and Other Data, page 77

8. Your statements cautioning investors not to give "undue weight" to estimates, projections
and other information concerning market, industry and other data as well as your
statements that such information is "inherently imprecise" implies a disclaimer of
responsibility with respect to the third party information. Please revise these statements to
eliminate any implication that investors are not entitled to rely on the information included
in your registration statement.

Our Differentiated Approach, page 114

9. Please revise to provide legible graphics on page 114. We note that the text accompanying
the pictures is illegible.

Figure 12. ATH-1017 Had a Large and Rapid Effect on P300 Latency in AD Subjects, page 120

10. We refer to your graphics comparing your P300 latency results to results observed after
treatment with approved therapies Donepezil and Rivastigmine. Since you have not
conducted head to head trials, please revise your disclosure to clearly state this fact and
disclose why you believe this comparison is appropriate. If you provide disclosure
regarding results from other trials, expand your disclosure to provide the other information
regarding these trials that would help an investor make a meaningful comparison (e.g,

number of patients, dosage, how the baseline was measured in each study, etc.).

Event-related Potential, page 125

11. Please provide support for your statement that "the sustained effects on P300 latency
observed in the pre-dose recordings on subsequent testing days . . . most likely reflect the
long-term regeneration of neuronal connections and the improvement in brain function."

Our Neuropsychiatric Program (ATH-1019), page 131

12. We note your statement that ATH-1019 "has been shown to activate the HGF/MET system, and distribute to the CNS, and is neuroactive in animal models." Please provide the data that you used to make this conclusion.

Our Collaboration and Grant Agreements
Washington State University Research Foundation License Agreement and Amended and Restated Washington State University License Agreement, page 137

13. Please disclose the royalty term and termination provisions for the amended and restated license agreement and file the agreement as an exhibit or explain the basis for your determination that it is not required to be filed. We also note that your licensed patents under this agreement include WSU s rights to a patent jointly owned with Pacific Northwest Biotechnology, Inc. Please discuss whether you expect this joint ownership to have any effect on your license of the patent or your development of the product candidate to which the patent relates.

Principal Stockholders, page 174

14. Please revise your disclosure to identify the natural person or persons who have voting and investment control of the shares held by the entities affiliated with RTW Master Fund, Ltd., Viking Global Opportunities Illiquidity Investments Sub-Master LP and the entities affiliated with Franklin Templeton Investments. Please also revise your disclosure to identify the natural person or persons who share, along with Mr. Edelman, voting and dispositive power over the shares held by Perceptive Life Sciences Master Fund Ltd.

Financial Statements
Notes to Financial Statements
7. Significant Agreements, page F-15

15. Please clarify how you determined that the grant liability is an eligible item under ASC 825-10-15-4. If applicable, describe how the grant liability meets the definition of a financial liability.

You may contact Michael Fay at 202-551-3812 or Daniel Gordon at 202-551-3486 if you have questions regarding comments on the financial statements and related matters. Please contact Deanna Virginio at 202-551-4530 or Ada D. Sarmento at 202-551-3798 with any other

questions.

Sincerely,

FirstName LastNameLeen Kawas, Ph.D.

Division of Corporation Finance

Comapany NameAthira Pharma, Inc.

Office of Life Sciences

cc: Michael Nordtvedt, Esq.