### <u>Materials Design Analysis Reporting (MDAR)</u> Checklist for Authors

The MDAR framework establishes a minimum set of requirements in transparent reporting applicable to studies in the life sciences (see Statement of Task: doi:10.31222/osf.io/9sm4x.). The MDAR checklist is a tool for authors, editors and others seeking to adopt the MDAR framework for transparent reporting in manuscripts and other outputs. Please refer to the MDAR Elaboration Document for additional context for the MDAR framework.

### **Materials**

Antibodies	Yes (indicate where provided: section/paragraph)	n/a
For commercial reagents, provide supplier name, catalogue number and RRID, if available.	Methods/paragraph 3	
Cell materials	Yes (indicate where provided: section/paragraph)	n/a
Cell lines: Provide species information, strain. Provide accession number in repository OR supplier name, catalog number, clone number, OR RRID Primary cultures: Provide species, strain, sex of origin, genetic modification status.		No work was performed via cell lines.
Experimental animals	Yes (indicate where provided: section/paragraph)	n/a
Laboratory animals: Provide species, strain, sex, age, genetic modification status. Provide accession number in repository OR supplier name, catalog number, clone number, OR RRID  Animal observed in or captured from the field: Provide species, sex and age where possible  Model organisms: Provide Accession number in repository (where relevant) OR RRID		No work was performed via animals or model organisms in this study.
Plants and microbes	Yes (indicate where provided: section/paragraph)	n/a
Plants: provide species and strain, unique accession number if available, and source (including location for collected wild specimens)  Microbes: provide species and strain, unique accession number if available, and source	,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	No work was performed via plants or microbes in this
		study.
Human research participants Identify authority granting ethics approval (IRB or equivalent committee(s), provide reference number for approval.	Yes (indicate where provided: section/paragraph) Methods/paragraph 1	n/a
Provide statement confirming informed consent obtained from study participants.	Individual consent for this retrospective analysis was waived	
Report on age and sex for all study participants.	Methods/paragraph 1	

# <u>Design</u>

Studyprotocol	Yes (indicate where provided: section/paragraph)	n/a
For clinical trials, provide the trial registration number <b>OR</b> cite DOI in manuscript.		No clinical trials were performed in this study.
Laboratoryprotocol	Yes (indicate where provided: section/paragraph)	n/a
Provide DOI or other citation details if detailed step- by-step protocols are available.	Methods/paragraph 3	
Experimental study design (statistics details)	Yes (indicate where provided: section/paragraph)	n/a
State whether and how the following have been done, <b>or</b> if they were not carried out.		
Sample size determination		
Randomisation		No clinical trials were performed in
Blinding		this study.
Inclusion/exclusion criteria	Methods/paragraph 1	
Sample definition and in-laboratory replication State number of times the experiment was replicated in laboratory  Define whether data describe technical or biological replicates	Yes (indicate where provided: section/paragraph)	No experiments in vitro were performed.
Ethics	Yes (indicate where provided: section/paragraph)	n/a
Studies involving human participants: State details of authority granting ethics approval (IRB or equivalent committee(s), provide reference number for approval.	Methods/paragraph 1	
Studies involving experimental animals: State details of authority granting ethics approval (IRB or equivalent committee(s), provide reference number for approval.		No experimental animals were involved in this study.
Studies involving specimen and field samples: State if relevant permits obtained, provide details of authority approving study; if none were required, explain why.	Footnote/Ethical Statement	
Dual Use Research of Concern (DURC)	Yes (indicate where provided: section/paragraph)	n/a

#### DRAFT | June 2019

If study is subject to dual use research ofconcern, state the authority granting approval and reference number for the regulatory approval		No dual use research of concern in this study.
--	--	---

# <u>Analysis</u>

Attrition	Yes (indicate where provided: section/paragraph)	n/a
State if sample or data point from the analysis is	Methods/paragraph 1	
excluded, and whether the criteria for exclusion were		
determined and specified in advance.		

Statistics	Yes (indicate where provided: section/paragraph)	n/a
Describe statistical tests used and justify choice of	Methods/paragraph 4-5	
tests.		

Data Availability	Yes (indicate where provided: section/paragraph)	n/a
State whether newly created datasets are available,		No newly
including protocols for access or restriction on		created
access.		datasets
If data are publicly available, provide accession		were used
number in repository or DOI or URL.		in this
,		study.
If publicly available data are reused, provide		No publicly
accession number in repository or DOI or URL, where		available
possible.		data were
		reused.

Code Availability	Yes (indicate where provided: section/paragraph)	n/a
For all newly generated code and software essential for replicating the main findings of the study:		
State whether the code or software is available.		No newly generated code and software were used in this study.
If code is publicly available, provide accession number in repository, or DOI or URL.		

# Reporting

Adherence to community standards	Yes (indicate where provided: section/paragraph)	n/a
MDAR framework recommends adoption of discipline-specific guidelines, established and endorsed through community initiatives. Journals have their own policy about requiring specific guidelines and recommendations to complement MDAR.		
State if relevant guidelines (eg., ICMJE, MIBBI, ARRIVE) have been followed, and whether a checklist (eg., CONSORT, PRISMA, ARRIVE) is provided with the manuscript.	ICMJE guidelines were followed, as the journal follows ICMJE recommendations for publication.	

Article information: <a href="https://dx.doi.org/10.21037/gs-22-52">https://dx.doi.org/10.21037/gs-22-52</a>	