<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	No commercial reagent in this study.	n/a
name, catalogue number and RRID, if available.		

Cell materials	Yes (indicate where provided: section/paragraph)	n/a
Cell lines: Provide species information, strain.	No Cell line in this study.	n/a
Provide accession number in repository OR supplier name, catalog number, clone number, OR RRID		
Primary cultures: Provide species, strain, sex of	No culturing in this study.	n/a
origin, genetic modification status.		

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	No laboratory animal in this study.	n/a
Animal observed in or captured from the field: Provide species, sex and age where possible	No animal in this study.	n/a
Model organisms: Provide Accession number in repository (where relevant) OR RRID	No model organism in this study.	n/a

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)	No plant in this study.	n/a
Microbes: provide species and strain, unique accession number if available, and source	No microbe in this study.	n/a

Human research participants	Yes (indicate where provided: section/paragraph)	n/a
Identify authority granting ethics approval (IRB or equivalent committee(s), provide reference number for approval.	Footnote/ paragraph 2	
Provide statement confirming informed consent obtained from study participants.	The article does not require a statement confirming informed consent obtained from study participants. since all of the clinical material were anonymized CT-scans images used for dosimetric repeated assays at a remote time from the real treatment of the patients.	n/a
Report on age and sex for all study participants.	Methods/ Patients/ paragraph 2	

<u>Design</u>

Study protocol	Yes (indicate where provided: section/paragraph)	n/a
For clinical trials, provide the trial registration number OR cite DOI in manuscript.	This study is not a clinical trial.	n/a
Laboratory protocol	Yes (indicate where provided: section/paragraph)	n/a
Provide DOI or other citation details if detailed step- by-step protocols are available.	References/number 9	
Experimental study design (statistics details)	Yes (indicate where provided: section/paragraph)	n/a
State whether and how the following have been done, or if they were not carried out.		
Sample size determination	Results/ Characteristics of patients/ paragraph 1	
Randomisation	Results/ Characteristics of patients/ paragraph 1	
Blinding	Results/ Characteristics of patients/ paragraph 1	
Inclusion/exclusion criteria	Methods/ Patients/ paragraph 2 and 3	
Sample definition and in-laboratory replication	Yes (indicate where provided: section/paragraph)	n/a
State number of times the experiment was replicated in laboratory	No experiment in this study.	n/a
Define whether data describe technical or biological replicates	Methods/ Data analysis and statistics/ paragraph 1	
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.	Footnote/ paragraph 2	
Studies involving experimental animals: State details of authority granting ethics approval (IRB or equivalent committee(s), provide reference number for approval.	No experimental animal in this study.	n/a
Studies involving specimen and field samples: State if relevant permits obtained, provide details of authority approving study; if none were required, explain why.	No specimen and field sample in this study.	n/a
Dual Use Research of Concern (DURC)	Yes (indicate where provided: section/paragraph)	n/a
If study is subject to dual use research of concern, state the authority granting approval and reference number for the regulatory approval	No dual use research of concern in this study.	n/a

Analysis

Attrition	Yes (indicate where provided: section/paragraph)	n/a
State if sample or data point from the analysis is	Methods/ Patients/ paragraph 3	
excluded, and whether the criteria for exclusion were		
determined and specified in advance.		

Statistics	Yes (indicate where provided: section/paragraph)	n/a	l
Describe statistical tests used and justify choice of	Methods/ Data analysis and statistics/ paragraph 1	1	l
tests.		1	l

Data Availability	Yes (indicate where provided: section/paragraph)	n/a
State whether newly created datasets are available, including protocols for access or restriction on	We have a data sharing statement.	
access.		
If data are publicly available, provide accession	Emails could be sent to the address below to obtain the	
number in repository or DOI or URL.	shared data: zhangwei7820@163.com.	
If publicly available data are reused, provide	Emails could be sent to the address below to obtain the	
accession number in repository or DOI or URL, where	shared data: zhangwei7820@163.com.	
possible.		

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.	Results/The predictive ability of the model in the test set/paragraph 1	
If code is publicly available, provide accession number in repository, or DOI or URL.	Emails could be sent to the address below to obtain the shared data: zhangwei7820@163.com.	

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,	ICMJE guidelines were followed, as the journal follows	
ARRIVE) have been followed, and whether a checklist	ICMJE recommendations for publication.	
(eg., CONSORT, PRISMA, ARRIVE) is provided with		
the manuscript.		

Article information: https://dx.doi.org/10.21037/tcr-21-2545