

'Denialism' has no place in scientific debate

To the editor:

I was intrigued to find my name on Megan Scudellari's short list of "today's most vocal denialists spreading ideas that counter the consensus in health fields"¹. I am a prominent and published critic of the assertions of everyone else on the list, except for Wolfgang Wodarg—who doesn't belong there either.

'Denialist' is an *ad hominem* argument, the meaning of which is defined entirely by the user, intended to discredit the accused without evidence. Scudellari's charge illustrates this. "Fumento claims embryonic stem cell research is both 'a dead end', fueled by a greedy lobby, and dangerous, despite evidence from animal studies suggesting its promise," she writes. "He uses a picture of a tumor with teeth and hair growing from it to illustrate his point." Guilty. I have always presented human embryonic stem cell (hESC) research not in a vacuum but compared to competing technologies, noting that they have only shown promise in animal studies. This reflects inherent dangers, including the

development of teratomas such as that which I depicted.

When James Thompson in 1998 announced the creation of the first human hESC culture, his research team warned "clinical applications are perhaps *as much as* a decade away" (emphasis added)². Almost a decade later, addressing a 2007 Wisconsin convention, Thompson, citing "serious safety concerns," changed the time frame to "decades away," as paraphrased by the AP³. Other hESC researchers use timelines of "three to five decades"⁴.

Conversely, the therapeutic use of adult stem cells dates back to 1956, and today they have numerous therapeutic applications^{5,6}. They have been used in thousands of clinical trials.

It might seem that Scudellari is in denial.

Michael Fumento

*Independent Journalism Project, Arlington, Virginia, USA.
e-mail: fumento@pobox.com*

CORRESPONDENCE

Published online at <http://www.nature.com/naturemedicine/>.

Reprints and permissions information is available online at <http://npg.nature.com/reprintsandpermissions/>.

COMPETING FINANCIAL INTERESTS

The author declares no competing financial interests.

1. Scudellari, M. *Nat. Med.* **16**, 248 (2010).

2. Peterson, J. Parent cell cultivation could help disease treatment. <<https://list-serv.utoronto.ca/cgi-bin/wa?A2=parkinsn;MaCgPw;19981106080715-0500a>> (1998).
 3. Foley, R.J. Stem cell pioneer warns of roadblocks before cures. *GazetteXtra* http://www.gazetteextra.com/stemcells_speech020907.asp (9 February 2007).
 4. Stem-cell researchers cautious about timeframe for human cures <http://health.dailynewscentral.com/content/view/000813/44> (22 May 2005).
 5. Little, M.T. & Storb, R. *Nat. Rev. Cancer* **2**, 231–238 (2002).
 6. Burt, R.K. *et al. J. Am. Med. Assoc.* **299**, 925–936 (2008).
-