After completing his BTech from IIT Madras in 1980, Atul Chokshi obtained his phd from the University of Southern California (Los Angeles). Following stints as a post-doctoral research fellow and being a faculty member at the University of Southern California, he returned to India in 1994 and is currently a Professor in the Materials Engineering Department at the Indian Institute of Science, Bangalore. His research interests deal with the mechanical behavior of materials, and more recently he has also been involved in interactions between science and society.

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Although neither of us has any formal background in ecology, we are both familiar with the scientific process and are also concerned about issues related to science and society. We recently heard about the report by an expert scientific committee on Challakere and have formed an opinion based on a critical evaluation of the report and related factors. We give in the following three pages a statement outlining our serious concerns.

Atul H. Chokshi
Arati Chokshi August 20, 2013

The Challakere Conundrum

In 2008-09, the Karnataka govt proclaimed the setting up of a scientific hub in Challakere, near Chitradurga, Karnataka. Land was provided to several projects including (in acres) 4,290 to the Defence Research and Development Organization (DRDO), 1,810 to the Bhabha Atomic Research Centre (BARC), 1,500 to the Indian Institute of Science (IISc), 1,000 to Sagitaur Ventures Pvt Ltd, 573 to the Indian Space Research Organisation (ISRO), and 300 to the Karnataka Small Scale Industrial Development Corporation.

The Environmental Support Group in Bangalore challenged the notification on land transfer in the National Green Tribunal (NGT), questioning the diversion of the ecologically sensitive Amrit Mahal Kaval land, critical for local communities depending on the Kavals (pasture lands) for their life and livelihood. The ecology and biodiversity of such lands has been maintained over centuries by local self-sustaining communities, who were termed "wise custodians" of their environment, in a rapid biodiversity assessment by the Centre for Ecological Sciences (IISc). The points raised by the petitioners were deemed worthy enough by the NGT to initiate further investigation by an expert fact finding committee in April. Unfortunately, the July report of the expert committee is incomplete and appears strongly biased against the local communities.

The expert report acknowledges the stark reality of about 1.3 lakh people being dependent on the local kaval lands, of which about 9,500 acres has been allotted to upcoming projects, leaving behind only a non-sustainable and fragmented 1,900 acres. The drastic reduction in the total grazing area left forebodes a death knell for local pastural activities, already reportedly leading to distress cattle sales and a concomitant reduction in sustainable livelihood means. The tenor of the report, however, reduces this human reality to a mere BPL statistic that needs to be improved. In shocking condescension and over-reach, the govt land transfer occurred without consulting the local communities, who discovered the transfer only when project boundary walls came up, precluding their access to grazing lands, fodder and small forest produce necessary for their livelihood.

While a large portion of the report is devoted to the historical developments of pasture lands and the varieties of cattle in the region, surprisingly, for an expert scientific report, very limited quantitative data are presented and analysed critically. For example there is no quantification of either local resources necessary for the projects, such as water and power, or of any assured benefits to the local communities. The report merely accepts uncritically the responses from project organizations. In contrast, the report is skeptical when relating to the problems of the villagers, noting that many have repeated the same grievances. It would indeed be surprising to hear of different grievances with respect to the impending loss of livelihood.

The Challakere area is arid, drought prone and has limited water supply. Villagers have complained of their shallower bore wells drying out due to new bore wells within the project boundaries. The report claims that water piped from the Vani Vilas Sagar dam, which is about 50 kms from the project region, will supply all the needs of the projects and the local communities. This is a surprising conclusion when most organisations have not yet developed master plans, and there are no quantitative data on water requirements. Furthermore, the Vani Vilas Sagar dam is over a hundred years old, and water has reached the maximum height of the dam only once, in 1933. Inadequate rains and reduced water in the dam has already caused severe problems for agriculture recently, and the new projects can potentially exacerbate water crises and conflicts in future.

The statement from the ministry of environment and forests that non-civil runways do not come under its purview is misrepresented as DRDO not requiring any environmental clearance. Further, while all the project beneficiaries have provided statements on proposed compliance of the hazardous waste rules, there is no indication on the quantity of toxic waste generated, or the transport and handling of nuclear material and radioactive waste that will be generated by BARC in their nuclear fuel processing. The effect of the proposed runway by DRDO and the testing of aero-vehicles on the region's fragile ecological balance is also missing from the report.

Two important questions arise from the report's vision of benefits trickling down to the local community, including reduced migration to cities because of potential economic opportunities and improved education, health, and infrastructure facilities currently lacking in the region. First, even if such benefits and local uplifting could be assured, it must be recognized that it would take over a decade or two to develop these projects; in the meantime, the local community cannot sustain its pastoral livelihood. Second, why should citizens of India get due benefit only if they accept "development" that is thrust upon them – and why should the govt not provide appropriate education and other facilities immediately, as required by law?

Irrespective of the desirability of such progress or any legalities, there is a need to ensure that a process of consensual development is followed so that real people, animals and their ecosystems are not reduced solely to collateral damages of a top-down developmental paradigm. A critical examination of this and other project reports is essential to avoiding erroneous decisions on the basis of inadequate or misleading information. To limit current and future conflicts, and in keeping with our professed democratic ideals, it is necessary to re-emphasize the public in public policy, and undertake large scale projects only after local consultation and informed consent.

Professor Atul H. Chokshi (IISc) and Dr. Arati Chokshi are residents of Bangalore; the views expressed are personal.