

Blanc produced a report that was not louder than that of a cracker exploded at the base of the mountain. The solitary silence of mountains is indeed so well known, that it has become proverbial, and almost an essential property of the poet's elysium. It is not, however, so generally known that there is a physical reason for this result, for it is usually imagined that it arises from the destitution of animal life, which is not in itself sufficient to account for the phenomenon.

But although the intensity of sound is diminished by the rarefaction of the air, yet the atmosphere is capable of conducting sound at heights which cannot be attained by man. The sound produced by the explosion of the meteor of 1719 was like that of a large cannon, although it was at an elevation of sixty-nine miles. The great meteor of 1783, which was said to be half a mile in diameter, and to move with a velocity of twenty miles in a second, produced a distinct rumbling sound, although it was at the height of fifty miles at the time of explosion. These facts prove that air is capable of conducting sound even when in a state of great tenuity, as it must be at these heights, and we may also learn from them that the atmosphere extends beyond that limit at which it has the power of refracting light.

The intensity of sound, and the distance at which it may be heard, are considerably influenced by the state of the atmosphere. Fogs, rain, and snow obstruct the passage of sound, a circumstance that must have been observed by every one. A clear, cold atmosphere is favourable to the ready and perfect conducting of sound, and especially when it is carried over the surface of water or ice. We remember to have frequently listened, in a cold winter's evening, to military music, the tones of which were softly borne over the quiet waters from a distance. It must also have been noticed by the reader that sounds are more audible by night than by day. It is true that the silence which universally prevails may render us more sensible of feeble sounds than during the bustle and animation of the day, but there is another reason for this phenomenon. At night there is a greater uniformity in the temperature and density of the atmosphere; for all the ascending heated currents of the air which result from the action of the sun's rays, cease with the activity of the agent that gave them birth. An irregular