

orchards, avenues and parks. They claim that trees make generous returns for the room they occupy. The close relation of trees to the public prosperity, is seen in the present difficulty of finding sufficient water for the Erie Canal. The enlargement of the canal and its business requires more water than formerly, when, in fact, the supply is alarmingly deficient. There is one reason for this deficiency in the wasteful cutting down of forests on the hill-sides, whence flow numerous small streams that unite to fill the vast aorta of our inland commerce.

The destruction of trees not only diminishes the absolute quantity of rain, but prevents its accumulation in springs, shaded valleys, and swamps. A bare hill side will shed water like a roof. Let the trees remain as nature intended, and the same soil becomes a sponge, absorbing the rain as fast as it falls, and sending it down little by little to the thirsty lowlands.

In the early stages of our country's growth, little attention was paid to the culture of trees. The names of the pioneer Philharborists are few, and their chief encouragement seems to have come from across the Atlantic. There is a queer old house still standing on the banks of the Schuylkill, that might be called the Cradle of American Botany. It was built by John Bartram, who founded the first Botanic Garden in this country. Bartram was an honest Quaker, little noticed at home, but honored abroad, as a collector of rare trees and plants. He kept up an active correspondence with eminent savans in England. Dr. Darlington's recent publication of these letters created a pleasant effervescence in the literary circles of Europe and America. Andre Michaux, and his son Francis Andre Michaux, should be remembered. They were Frenchmen, and served the French Government. Yet most of their scientific labor was performed in this country. They were heartily attached to American institutions. They sent home about sixty thousand trees and plants, with many boxes of seeds, as the result of their searching in our nation's wilds. The younger Michaux lived to be eighty-five, and spent his last days in planting a group of American trees. His *North American Sylva*, recently edited by J. Jay Smith, of Philadelphia, has no equal on the subject which it treats. He bequeathed \$22,000 to societies in Boston and Philadelphia, for special purpose connected with the propagation of useful trees.

Among the early Pomologists, William Coxe, of New Jersey, stands foremost. His work on the Cultivation of Fruit-Trees was prepared without much help from previous authors, and is still appealed to as reliable authority. Mr. Coxe sent scions of the *Seckel* Pear to the London Horticultural Society, of which he was soon after elected a member.

The name of Downing is dear to every lover of rural improvement. His *Treatise on the Theory and Practice of Landscape Gardening*, published in 1841, gave him a solid and brilliant reputation on either side the Atlantic. The book was thoroughly practical, yet tall alive with poetry and sparkling sentiment. It was read like a romance, and removed the scales from eyes previously blind to the beautiful in trees and landscapes. The youngest son of a gardener on the Hudson, Downing was so reserved in his habits, that few suspected the rare qualities of his mind, before his appearance as an author. He had grown up as a neglected seedling might have done in an out-of-the-way corner of his father's grounds, until its rich ripe fruit caught the gaze of passers-by, and pregnated the air with daintiest aroma. Downing was thought by some to be unsocial and haughty; yet there never lived a man more intensely American. It was a favorite idea with him that America was entitled to a style of Architecture distinctly its own, and suited to our climate, scenery and habits. The working out of this idea is clearly seen in his Essays and drawings. He was partial to American trees, and often exposed the folly of preferring such exotic impositions as the *Ailanthus* and the *Abele*, to the Maple, the Elm, and the *Liriodendron*. His whole life, genius and ambition were devoted to the elevation of his countrymen, to the improvement of their homes, and the multiplying of their ennobling pleasures. His premature death, in 1852, so painfully remembered with the burning of the *Henry Clay*, was an irreparable loss to American literature and art.

Living Philharborists are doing much, at this time, to promote the knowledge and culture of desirable trees. Never was there a period when so much of capital, enterprise and research was given to this most important branch of national industry. The peculiar and promising feature of the present enthusiasm in tree-culture, is that its friends are forming themselves into groups, for particular studies and experiments. In the cultivation of Pears, Marshall P. Wilder, of Dorchester, Mass., takes the lead.