Somerville
Urban
Forestry
Committee

September 18, 2020

To the Mayor and the City Council of Somerville,

We are writing to share a statement by Somerville's Urban Forestry Committee on the planned remediation of Conway Park. The Committee discussed this topic at our public meeting on September 17, 2020. After a motion and a second, we adopted the language below by roll call vote. Six committee members voted in favor, and two voted against.

We urge specific actions both by the Mayor's office and also by the City Council. We hope that you will review this statement thoughtfully, and that you will take our advice into consideration.

Thank you for your attention and for your ongoing service to our city.

Sincerely,

Chris Dwan and Althea Northcross
Co-Chairs, Somerville Urban Forestry Committee

somervilleufc@gmail.com
www.somervillema.gov/ufc

WHEREAS Somerville is in the final stages of planning for the remediation of Conway Park, with a request to bond $3M expected at the city council meeting of September 24, 2020, and

WHEREAS This remediation will necessarily involve the removal of up to 60 mature trees due to the fact that they are growing in contaminated soil, and

WHEREAS Per the city's 2016 "athletic fields master planning report," an artificial turf field will be installed at Conway, replacing the natural grass field, and

WHEREAS The proposed remediation will remove only the top 18" of soil, installing a fabric barrier to encapsulate any contaminated soil beneath that depth, and

WHEREAS An 18" soil depth, with a fabric barrier beneath, is inadequate to support the healthy growth of replacement trees of the same size as the mature trees that must be removed[1][2][3], and

WHEREAS The 18" remediation depth is inadequate to support a natural grass field, and

WHEREAS Artificial turf fields contribute to the urban heat island effect[4][5][6], and

WHEREAS Artificial turf fields can reach surface temperatures of 140 degrees and beyond on warm, sunny days, increasing the risk of skin burns, heat exhaustion, confusion, heat stroke, and even death, particularly for young players[7], and

WHEREAS Somerville's Climate Change Vulnerability Assessment of 2017 predicts that within 10 years, Somerville can expect 40 days a year with temperatures over 90 degrees, and

WHEREAS Many of the materials in artificial turf are non-renewable, toxic, and must be replaced regularly, requiring that the spent materials be disposed of as hazardous waste, and

WHEREAS The materials installed in local artificial turf fields in have already been found infiltrating the local environment, including in storm drains leading to the Mystic River, and

---

[1] "Soil for Urban Tree Planting," E. Thomas Smiley, Bartlett Tree Experts, Technical report
[2] "Planting a tree successfully requires the correct planting depth," Gretchen Voyle, Michigan State University Extension, September 23, 2015
[3] "Handbook of Regenerative Design," Robert France, Nature Press, 2007
[4] "Synthetic Sports Fields and the Heat Island Effect," Sonia Myrick, Parks and Recreation Vol 54 No 5, May 2019
[5] "Intense summer heat fluxes in artificial turf harm people and environment," C.Y. Jim, Landscape and Urban Planning Vol 157, January 2017
[6] "Comparison of surface temperatures of different synthetic turf systems and natural grass: Have advances in synthetic turf technology made a difference," Lauren Petrass, Dara Twomey, Jack Harvey, et al., Journal of Sports Engineering and Technology, October 2014
[7] "Synthetic Surface Health Studies," C. Frank Williams and Gilbert E. Pulley, Sports Turf Managers Association Annual Conference, January 2004

WHEREAS The proposed artificial turf field will be fenced and locked, effectively removing it as a neighborhood park and leaving the field inaccessible for concerts, picnics, and other outdoor activities, and

WHEREAS Somerville already has the least green and open space per person of any city in the Greater Boston area, which has been painfully apparent and dangerous during the pandemic of 2020, and

WHEREAS In 2005, Mayor Curtatone committed Somerville to "meet or beat" the greenhouse gas emission reduction target suggested for the United States in the Kyoto Protocol, and

WHEREAS In 2012 the Board of Aldermen formally recognized the existence of a climate emergency, and

WHEREAS In 2015, Mayor Curtatone signed a "compact of Mayors" committing Somerville to take urgent action to prepare for and to prevent climate change, and

WHEREAS Somerville's "Climate Forward" plan of 2018 calls on the city to expand our urban tree canopy and to take measures to combat the urban "heat island" effect, and

WHEREAS Modern practices for maintenance and management of grass fields allow playing hours well beyond the 500 hours per year claimed in the city's 2016 "athletic fields master planning report,"[8] and

WHEREAS Our awareness of the environmental situation in our city and worldwide has changed substantially since the adoption of that 2016 plan for our fields,

NOW THEREFORE:

The Urban Forestry Committee of Somerville urges the Curtatone Administration to revise its plans for Conway field. We urge the Mayor to remediate the contaminated soil to a depth of at least 36 inches and to retain this park as a space suitable for trees, with a natural grass playing field.

We further urge the Mayor to update the athletic fields master plan with a focus on renewable living materials, safe play spaces for the coming heat, trees, and organic maintenance practices that can maximize playable hours without resorting to artificial turf.

Finally, we urge the City Council to reject any funding requests for Conway Park that commit the city to artificial turf or to any further reductions in our urban canopy and our green and open spaces.

[8] "New Field Care Methods Allow for More Traffic on Grass Fields," Stacie Roberts, Sports Field Management, October 1, 2012