

A private school in Montreal, Canada, serving children grades 1-12 has installed a synthetic turf field extolling to parents the benefits that would come from this field. These are the typical selling points given by the synthetic turf industry to all schools and towns

1. Extended outdoor athletics season:

The synthetic turf field allows us to prolong the athletic seasons and alleviates the need to bus players to off-site indoor facilities for spring season training.

2. Improved safety for players:

A consistently flat, well-drained playing surface reduces injuries associated with playing on uneven surfaces.

3. Increased playtime:

A synthetic turf field allows Junior School students to be outdoors year round, and the school can host more activities without risking the fields for regular season athletics and physical education.

4. Increased durability:

A synthetic turf field can better sustain the wear and tear due to extensive usage and damage from the elements.

After the school installed the synthetic turf field, a number of parents became concerned about the rubber crumb infill and the health of their children on this field. When the parents asked the school to test the rubber tire infill the school agreed. The school sent a sample of the crumb rubber to Paris, France where the rubber infill was tested. The test came back and the school then claimed that the test showed that all components of the crumb rubber were below safety levels and that everything was fine as the test passed with flying colors.

What is wrong with this picture?

The testing lab in Paris, France only looked for metals -- they never looked for the toxic chemicals that pose a threat to children's health and are known to be in tires. (Environment and Human Health, Inc. will list those chemicals at the end of this email.) Any school or laboratory should certainly know what to test for -- rubber tires have been around for a very long time and there is an enormous amount of data about what is in tires. If nothing else - a tire has between 20 and 30 % carbon black -- and carbon black is a carcinogen.

Dr. David Brown, Sc.D., Public Health toxicologist said, "The school's test and its report is an insult to the parents who care about the safety of their children. The failing of this report is exacerbated by the fact that there are multiple reports that have previously

showed what organic chemicals and black carbons are the important ones that should be examined and looked for."

Dr. Brown continued, "The synthetic turf industry is irresponsible in the face of demonstrated cancer cases linked to their product."

Nancy Alderman, President of Environment and Human Health, Inc., said, "Now the manufacturer of this field, "Act Global", is claiming the safety of their fields by touting this sham report from the school in Montreal on their facebook page found at <https://www.facebook.com/ActGlobalTurf>. This kind of false advertising and "pretend" testing only perpetuates these fields that are filled with toxic materials and continue to pose real health threats to the children who play on them. It is now time for a congressional hearing concerning these fields," continued Alderman.

Chemicals of concern that should be looked for when testing crumb rubber infill are listed below. These chemicals have been chosen because they are the chemicals normally found in rubber tires - therefore one would expect to find these chemicals in the rubber tire infill used in synthetic turf fields.

1,3-butadiene: Carcinogen

Benzene: Carcinogen, Developmental Toxicant, And Reproductive Toxicant

Phtalates: Suspected Developmental Toxicant, Endocrine Toxicant, Reproductive Toxicant Polycyclic Aromatic Hydrocarbons (PAHs) Suspected Cardiovascular or Blood Toxicant, Gastrointestinal or Liver Toxicant, Reproductive Toxicant, Respiratory Toxicant.

(a) Flouranthene: a PAH which is a carcinogen

(b) Pyrene: a PAH: a blood toxicant

Manganese: Neurological toxin Carbon Black: Carcinogen Carbon Black Nanoparticles

(a) The highest volume use of carbon black is as reinforcing filler in rubber products, especially tires.

(b) Carbon black can be up to 30% of a rubber tire.

Benzothiazole: Skin and eye irritation, harmful if swallowed. There is no available data on cancer, mutagenic toxicity, teratogenic toxicity, or developmental toxicity.

Butylated hydroxyanisole: Recognized carcinogen, suspected endocrine toxicant, gastrointestinal toxicant, immunotoxicant (adverse effects on the immune system), neurotoxicant (adverse effects on the nervous system), skin and sense-organ toxicant. There is no available data on cancer, mutagenic toxicity, teratogenic toxicity, or developmental toxicity.

n-hexadecane: Severe irritant based on human and animal studies. There is no available data on cancer, mutagenic toxicity, teratogenic toxicity, or developmental toxicity.

4-(t-octyl) phenol: Corrosive and destructive to mucous membranes. There is no available data on cancer, mutagenic toxicity, teratogenic toxicity, or developmental toxicity.

From Environment and Human Health, Inc.

Environment and Human Health, Inc. (EHHI) is a ten-member, science-based non-profit organization composed of doctors, public health professionals and policy experts. The organization is dedicated to protecting human health from environmental harms through research, education and the promotion of sound public policy.

EHHI is not a membership organization and therefore all of its support comes from foundations and committed individuals. EHHI does not receive any funds from businesses or corporations.

EHHI has a website that gets 100,000 visitors a month - and that enables EHHI to reach people and state agencies all over the country. Its website can be found at: <http://www.ehhi.org>

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