Healthier Solutions

Product Chemical Hazard Screening Report

APRIL 2022



EXECUTIVE SUMMARY

he Campaign for Healthier Solutions a project of Coming Clean Inc. and the Environmental Justice and Health Alliance commissioned The Ecology Center Healthy Stuff Lab to conduct a screening of consumer products sold at discount retailers, also

known as dollar stores. This report presents a summary of the results of the testing and highlights select products with hazardous chemicals of concern from Dollar Tree and Family Dollar. One hundred twenty-four (124) Dollar Tree and Family Dollar products were purchased at seven retailers in California, Maine, New Mexico, Pennsylvania, and Ontario, Canada. The products tested from Canada were purchased from a Dollar Tree store in Collaboration with Environmental Defence Canada.

Sample Collection: In early 2021, 226 products were purchased from all of the leading dollar store retailers in the US and Canada. Products were purchased from seven states (Michigan, Pennsylvania, California, New Mexico, Washington, Maine, Texas) and Ontario, Canada. Products tested included 226 consumer products, 33 cans of food, and 22 packages of microwave popcorn. Receipts from 28 store purchases were also tested. The 226 products contained a total of 635 unique components or materials. Each of these were tested using one or more test methods, depending on the typical chemicals of concern for that product type.

For food products, the packaging, not the food, was tested.

Chemicals of concern are those which, due to their inherent hazardous properties, present a known or reasonably suspected risk to human health and/or the environment. The levels of concern for each chemical were established by Healthy Stuff Lab by reviewing levels restricted in one or more of the most protective government, corporate, or third-party standards on hazards in consumer products.

These levels are similar to those used in our 2015 sampling of dollar store products.

You can access the 2015 report here

Products were subjected to 4 different analytical techniques:

High-definition X-ray fluorescence spectroscopy (HD XRF): 635 product components were screened for elements of interest by HD XRF using an HD Mobile spectrometer by XOS. This technique measures levels of elements heavier than aluminum on the periodic table. This includes toxic metals such as lead and cadmium as well as bromine, chlorine, and phosphorus that, depending on the matrix, can indicate flame retardant chemicals.

Fourier Transform Infrared (FTIR) spectroscopy:

A subset of components were analyzed by FTIR to determine the polymer type (for example, cotton or polyethylene) and major additives. A subset were also subject to solvent extraction followed by FTIR to test for the presence of additives such as plasticizers or flame retardant chemicals.

Gas Chromatography/Mass Spectrometry (GC/MS)

Analysis: Eleven products determined to contain ortho-phthalates ("phthalates") or alternative plasticizers according to our FTIR screening were sent for further analysis at Eurofins, a contract laboratory.

Eurofins quantified phthalates by following the CPSC test method CPSC-CH-C1001-09.4. The method uses solvent extraction followed by internal standard addition and analysis of the extract by gas chromatography-mass spectrometry (GC-MS) for phthalates and other plasticizers of interest. The lab tested for eleven phthalates and four alternative plasticizers.

Total Fluorine by Oxygen Flask Combustion and Ion-Selective Electrode: Select food packaging was evaluated for possible PFAS presence at Galbraith Laboratories by measuring total fluorine. This method detects fluorine from both polymeric and non-polymeric PFAS and thus is used to screen items for likely PFAS.

ſ	Arsenic	Bromine	Cadmium	Chlorine	Chromium	Mercury	Lead	Antimony	Tin
	> 100	> 400	> 100	> 10,000	> 100	> 100	> 100	> 100	> 100

Threshold Levels, in parts per million

CHEMICAL HAZARD SCREENING SUMMARY DOLLAR TREE & FAMILY DOLLAR

he preliminary screening results for the Dollar Tree and Family Dollar products indicate a number of chemical hazards are present in these products. Overall, 56% of the products screened had one or more chemicals of concern. The following concerns were identified in the products which were tested.

- Canned food products with BPA-based epoxy can body coatings
- Pans and cookware coated with PTFE (a PFAS coating) and BPA-based epoxy
- Microwave popcorn products with PFAS coatings inside the packaging
- Bisphenol S in 100% of store receipts tested from all retailers
- Products made with flexible PVC which have plasticizers

Number of Products with Chemical of Concern (COC) Detected, above screening level ALL PRODUCTS - US & CANADA RETAILED

Retailer	# Products	1 or more COC	Percentage
Family Dollar	37	18	49%
Dollar Tree	87	52	60%
ALL - 2021	124	70	56%

US RETAILED PRODUCTS

Retailer	# Products	1 or more COC	Percentage
Family Dollar	37	18	49%
Dollar Tree	67	40	61%
ALL	104	58	55%

CANADA RETAILED PRODUCTS

Retailer	# Products	1 or more COC	Percentage
Dollar Tree	20	12	60%

Note: This data is preliminary and subject to change as further analysis of these products is completed.

DOLLAR TREE & FAMILY DOLLAR PRODUCTS TESTED, PRODUCT — BRAND/DISTRIBUTOR

DOLLAR TREE

12 Plastic Plates, Red — Just Pretending! Greenbrier International	Guitar Whistles Favors — Greenbrier International, Inc.
3-D Puzzle — Greenbrier International	Happy Birthday Paper Plates — Greenbrier International, Inc.
Angel of Mine Silicone Pacifiers — Greenbrier International, Inc.	Headbands — Greenbrier International, Inc.
Audio Cable with Carrying Case — Greenbrier International	Holographic Water Bottle — Greenbrier International, Inc.
Basic Solutions Banana Clips — Greenbrier International, Inc.	Infant Flatware — Angel of Mine Greenbrier International, Inc.
Bath Toys - Rubber Ducks — Greenbrier International	Italian Seasoning — Supreme Tradition Greenbrier International
Bath Toys - Rubber Frogs — Greenbrier International	Jewelry Set — Just Pretending Dress Up Fun! Greenbrier International
BPA Free Water Bottle — Greenbrier International,LLC	Just Pretending Bracelet - Multicolor — Just Pretending, Dress Up Fun Greenbrier International
Charm Fun Bracelet Fantaisie — BMe Greenbrier International	Just Pretending! Bangles — Just Pretending! Greenbrier International, Inc.
Child Swim Goggles — Greenbrier International, Inc.	Just Pretending! Jewelry Set — Just Pretending! Greenbrier International, Inc.
Cup, Stacking Block — Greenbrier International	LED Night Light - JoJo Siwa — Nickelodeon/Viacom Greenbrier International
Dinosaur Paper Plates — Greenbrier International,Inc.	Light-up Toothbrush — Brush Buddies
Earbuds — Greenbrier International, Inc.	Marvel Water Bottle with Straw — zak! Greenbrier International, Inc.
Earbuds — E-circuit Greenbrier International, Inc.	Mickey Mouse 9 Oz Bottle — Disney Baby RegentBaby Products
Earbuds with case — e-circuit Greenbrier International, LLC	Micro USB Cable — e-circuit Greenbrier International
Favors Surprises, Mustache Whistles — Greenbrier International	Necklace and Bracelet Jewelry Set — just pretending! dress up fun
Favors Surprises, Saxophones — Greenbrier International	Nissin Chow Mein, Teriyaki Beef Flavor — Nissin Nissin Foods
Fling Shot Chicken — Greenbrier International	Nylon Turner Spatula — Cooking Concepts Greenbrier International, Inc.
Fork & Spoon — Sesame Beginnings	Paper Plates 20 — Greenbrier International

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Party Plastic Table Cover, Rectangle — Party! Greenbrier International	Sesame Street Teether Toy — Regent Baby ProductsCorp.
Paw Patrol Pacifier with Cover — Regent Baby Products Corp.	Snack Containers — Angel of Mine Greenbrier International, Inc.
Plastic Easter Eggs — Greenbrier International, Inc.	Snap Clips — Greenbrier International, Inc.
Plastic Table Cover — Party!	Spill Proof Sippy Cup — angel of mine
Plastic Table Cover - Rectangle — Party! Greenbrier International	Sport Bottle - Official Krazy Straw — Fun Time FunTime International
Play Glow Bracelets & Connectors — Greenbrier International	Sport Earphones — e-circuit Greenbrier International
Primary Fork & Spoon — Arrow Home Products Co.	Teether Toy — Sasame Beginnings Regent Baby products
Rainbow Necklace — Greenbrier International, LLC	Toddler Toothbrush — Brush Buddies Baby Care
Reusable Cold Pack — Assured Greenbrier International, Inc.	Type C USB Cable — Greenbrier International
Reusable Shopping Bag - Blue & Purple Print — Greenbrier International	Unicorn Putty — One Love Midwood Brands, LLC
Rubber Duck Bath Toys — Bathtime Fun! Greenbrier International	USB Car Charger — e-circuit Greenbrier International
Sesame Street Fork & Spoon — Regent Baby ProductsCorp.	Water Bottle, Plastic 39 Oz. — Greenbrier International

FAMILY DOLLAR

3-Step Wound Care — Family Wellness	Glitter Girl Princess Set — Ja-Ru Inc.
9 Ounce Bottle — Kidgets Midwood Brands, LLC	Glitz & Glam Princess Set — glitter girl
Beaded Necklaces — Midwood Brands, LLC	Icy Bite Keys Soothing Teether — Nuby
Brush & Comb Set — Modesa Midwood Brands, LLC	Infant Spoons — Kidgets Midwood Brands, LLC
Bubble Gum Carrot — Midwood Brands, LLC	Kid's Dough — Kid's Toy JPW International
Butterflies Wall Decor — The Peel People, LLC	Kidgets Musical Toy, Car — Kidgets Midwood Brands,LLC
Crepe Streamer, Flame Resistant — Greenbrier International	Light Up Finger Lights — Midwood Brands, LLC
Elastic Headwrap — Modesa Midwood Brands, LLC	Loot Bags — Midwood Brands, LLC
Family Chef Printer Tablecloth — Family Chef	Musical Light — Kidgets Midwood Brands, LLC
Giant Snap Hand — Ja-Ru, Inc Midwood Brands, LLC	Musical Light Up Phone — Kidgets Midwood Brands,LLC

Nylon Ladle — Family Chef Midwood Brands, LLC	Silicone Nipples — Kidgets Midwood Brands, LLC	
Pacifiers — Kidgets Midwood Brands, LLC	Sippy Cup — Kidgets Midwood Brands, LLC	
Paper plates — Party!	SuperSoothie Pacifier — Phillips Avent Phillips Electronics Ltd.	
Party Plastic Table Cover, Rectangle, Color Print — Party! Greenbrier International	Tub Toys, 3 Pack Ducks, 8+ Months — Kidgets Midwood Brands, LLC	
Penne Rigate — Chestnut Hill	Two-tone In-Ear Buds — Sentry Industries, Inc.	
Printed Tablecloth — Family Chef	Umbrella Floral Print — Midwood Brands, LLC	
Rainbow Hearts Leggings Set — Midwood Brands, LLC	Vivitar Kidsafe Stereo Headphones — Vivtar Skar International	
Reusable Water Bottle — Midwood Brands, LLC.		

FOOD PACKAGING & COOKWARE SAMPLES

12 Inch Pizza Pan — Family Chef	Frutesa Raspberry Preserves (lid coating)
Act II Microwave Kettle Corn (packaging)	Gourmet Microwave Popcorn
Cake Pan — Cooking Concepts	Goya Tomato Sauce (can coating)
Campbell's Kitchen Classic Beef Barley Soup(can coating)	Kendale Farm Cream of Chicken (can coating)
Campbells Tomato Soup (can coating)	Nissin Chow Mein, Teriyaki Beef Flavor (packaging)
Chef Boyardee Beefaroni (can coating)	Penne Rigate (packaging)
Chestnut Hill Chunk Chicken Breast (can coating)	Pizza Pan — Cooking Concepts
Chestnut Hill French Style Green Beans (can coating)	Pop Weaver Microwave Popcorn (packaging)
Chestnut Hill Tomato Soup (can coating)	Pop Weaver, Extra Butter Microwave Popcorn (packaging)
Deerfield Mixed Vegetables (can coating)	Pop-Secret Microwave Popcorn (packaging)
Diced Tomatoes & Green Chiles (can coating)	Premium Popcorn Butter (packaging)
Dolly Mixed Vegetables (can coating)	Rotel Diced Tomatoes (can coating)
Family Chef 10-Inch Fry Pan Non-Stick	Southgate Beef Stew (can coating)



DOLLAR TREE & FAMILY DOLLAR PRODUCT HIGHLIGHTS

COOKING CONCEPTS PIZZA PAN

Retailer: Dollar Tree

Brand/Distributor: Cooking Concepts

UPC: 3927715283 **Retailer State**: Michigan

Chemicals of concern: BPA-based epoxy based

non-stick coating



COOKING CONCEPTS CAKE PAN

Retailer: Dollar Tree

Brand/Distributor: Cooking Concepts

UPC: 3927715283 **Retailer State**: Michigan

Chemicals of concern: BPA-based epoxy based

non-stick coating



FAMILY CHEF 10-INCH FRY PAN NON-STICK

Retailer: Family Dollar

Brand/Distributor: Family Chef

UPC: 32251294525 Retailer State: Michigan

Chemicals of concern: PTFE (PFAS) based non-

stick coating



FUNNY TEETH

Retailer: Dollar Tree

Brand/Distributor: Joking Around, Green-brier

International, Inc. **UPC**: 3927772533

Retailer State: Ontario, Canada

Chemicals of concern: PVC components (>50%

chlorine), DOTP plasticizer.



KIDS MUSICAL TOY CAR

Retailer: Dollar Tree

Brand/Distributor: Kidgets, Midwood Brands, LLC

UPC: 3225157309 Retailer State: Texas

Chemicals of concern: 17.4% (174,000 ppm) lead

in solder



VIVITAR KIDSAFE STEREO HEADPHONES

Retailer: Family Dollar

Brand/Distributor: Vivitar, Skar International

UPC: 8106648531 Retailer State: Texas

Chemicals of concern: 2.2% lead (22,000 ppm)

in solder; PVC cable insulation and coated

fabrics with DOTP plasticizers



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AUDIO CABLE WITH CARRYING CASE

Retailer: Dollar Tree

Brand/Distributor: Greenbrier International

UPC: 3927789219 **Retailer State:** Michigan

Chemicals of concern: PVC components (>50% chlorine), Phthalate and DOTP plasticizers



EARBUDS

Retailer: Dollar Tree

Brand/Distributor: E-circuit, Greenbrier

UPC: 3927755468
Retailer State: Michigan

Chemicals of concern: PVC components (>50% chlorine), DOTP plasticizer, 14.1% (141,000 ppm)

lead in solder



POP WEAVER BUTTER MICROWAVE POPCORN

Retailer: Dollar Tree

Brand/Distributor: Pop Weaver

UPC: 4166702929 Retailer State: Texas

Chemicals of concern: 353 ppm Total Fluorine

(PFAS grease-proof coating present)



DOLLY MIXED VEGETABLES

Retailer: Dollar Tree
Brand/Distributor: Dolly

UPC: 3913957419

Chemicals of concern: BPA-based epoxy



DEERFIELD MIXED VEGETABLE

Retailer: Dollar Tree

Brand/Distributor: Deerfield

UPC: 5306900571

Chemicals of concern: BPA-based epoxy



PURCHASE RECEIPTS

Retailer: Dollar Tree and Family Dollar

UPC: N/A

Retailer State: Multiple

Chemicals of concern: All receipts tested

positive for Bisphenol S



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CAMPAIGN FOR HEALTHIER SOLUTIONS ANCHOR GROUPS

Los Jardines Institute – Albuquerque, New Mexico Líderes Campesinas – Oxnard, California Harambee House – Savannah, Georgia

AFFILIATES AND PARTNER ORGANIZATIONS

Physicians for Social Responsibility-LA – Los Angeles, California Learning Disabilities Association of Maine -Windham, Maine Environmental Defence Canada – Toronto, Canada **Clean Production Action**

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