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Litter Strategy Monitoring Wave 82 – November 2021 Report

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On behalf of: KESAB Environmental Solutions

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Section 1 Introduction



1.1 This document has been prepared by McGregor Tan Research to report on Wave 82 of the quarterly KESAB Litter Monitor. Surveys for the current wave were conducted in South Australia during November 2021.

Background

- 1.2 Regular monitoring of the litter stream is necessary in order to maintain a clear picture of its components, such as the various material types that contribute to the litter stream as well as the distribution of litter across different area types. Keep South Australia Beautiful (KESAB) had been monitoring the State's litter stream for many years, but the level of detail required during the South Australian Government's moratorium on changes to Container Deposit Legislation was considerably greater than previously recorded.
- 1.3 An expanded monitoring program commenced in February 1998, and McGregor Tan Research was commissioned at that time to undertake the actual count and to report regularly on the outcomes. This expanded program has been continued ever since and is planned to continue in future as well.
- 1.4 The count was completed quarterly, with the exception of August 2002, carried out in February, May, August and November of each year until 2015. Since then, the data has been counted twice a year, in May and November.
- During each Wave of the survey, litter counts are undertaken at 151 sites across South Australia. In conjunction with the national litter count, a review of all South Australian sites showed that 11 of the sites surveyed were disproportionately represented in the data. These original sites were found to be unusual in nature, and were replaced with 11 revised sites.
- 1.6 The data collection form utilised for the count was jointly developed by McGregor Tan Research and KESAB. A copy of this form is provided in Appendix 2.
- 1.7 In January 2003, Container Deposit Legislation (CDL) was extended to cover most beverages under 1 litre, such as juice cartons, fruit boxes, flavoured milk cartons, etc.

 As a result, a new method of analysing the data had to be adopted so that the changes to the CDL, and the effect on the total litter stream could be evaluated.



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Prior to the August 2004 Litter Count, the data collection form was re-evaluated and re-designed to take into account the changes to the CDL and also to incorporate new categories for litter items that were previously coded as 'other' or in an inappropriate category. The changes that were made to the data collection form include:

- Plastic bags were separated into 3 types of litter:
 - Supermarket type lightweight shopping bags
 - Heavier glossy, typically branded carry bags
 - Sacks, sheeting and other bags
- Bottle and can tops were moved and separated from the Miscellaneous Category into both 'plastic bottle top' and 'metal bottle and can tops'.
- The following four litter types were also added to the Plastic Category:
 - Bread bag tags
 - o Lollipop sticks
 - Spoons/ cutlery
 - o Drink pouches
- The Metal Cans category name was changed to Metal.
- Foil takeaway was moved from Miscellaneous to Metal.
- Cigarette butts were separated from the Miscellaneous Category.
- Two extra items were added to the Paper/paperboard Category:
 - Paper bags
 - o Shopper dockets & related shopping paper

1.9 In previous waves, the data collection form separated each litter type into CDL and non-CDL categories However, extended Container Deposit Legislation (CDL) has now meant that the litter categories alone (e.g., Flavoured milk, < 1 litre) can be used to establish whether or not beverage containers are covered under CDL or not.

In order to determine the effectiveness of the current CDL (as of January 2003,), and for comparative purposes, it was necessary to re-calculate the number of current CDL items from the waves prior to the extension. References to CDL items in Waves prior to Wave 17 (waves 1-16) therefore denote beverage containers that are currently covered by CDL – not the items that were covered by the legislation prior to this time.

During the Wave 29 Monitor estimates of the volumes for each litter item category were defined. The assignments of volume estimates to each litter item category were based on actual measurements of containers/ items, the condition that these items were most commonly found (which was based on the audits of at least three Waves), and the most common or average size of the items that were found within each



category.

- 1.12 The auditors were an important part of the volume formulation process, and they were able to record the number, size and type of different items within each category over a number of waves. Volumes ascribed to each item represented the average size for that category across all site types.
- 1.13 The final volume attributed to each litter item category furthermore took into account the fact that some items were often found crushed and weathered. For example, some drink cans and cartons are often crushed and/ or weathered when they are identified by the auditors and counted. The same volume measurements have been used for all subsequent Waves.
- 1.14 Two noteworthy events that have taken place since the beginning of this longitudinal study include:
 - The deposit on drink containers was increased from 5 cents to 10 cents in September 2008.
 - The ban on thin plastic shopping bags came into effect in May 2009.
- 1.15 This document reports on Wave 82 of the longitudinal study. The litter count was conducted during November 2021. Section 2 of this report outlines the litter characteristics of the 151 sites, which include 11 revised sites (replacing 11 of the original 151). Appendix 1 contains charts tracking results back across all prior Monitors, and includes weighted results to facilitate meaningful comparison of results established at the 151 original sites with results derived from the 151 revised sites.



Section 2

Wave 82 Executive Summary



The following Executive Summary covers the findings of the November 2021 KESAB Litter Monitor (Wave 82). Where possible, results have been tracked against those derived from any previous Waves which incorporated revised sites. All 151 sites were counted during the May 2021 count.

Items Counted

A total of 8,716 litter items were counted across the 151 South Australian sites during Wave 82. This figure is higher than the previous monitor in May 2021 (7,821) and the monitor conducted in November 2020 (6,958) at the same time last year.

Cigarette butts remained the main contributor (29%) to the litter count with 2,550 butts counted in Wave 82, down from Wave 81 (2,550) in May 2021 but up from Wave 80 (1,741) in November 2020 conducted at the same time in the previous year.

The overall increase in number of items counted was most strongly demonstrated by several litter types in Wave 82, including:

- PLASTIC Snack bags & confectionery wrappers 388 items, up from 155 items in Wave
 81 (150% increase)
- PAPER/PAPERBOARD Masks 125 items, up from 0 items in Wave 81 (new listing)
- PLASTIC Wipes 90 items, up from 0 #DIV/0! items in Wave 81 (new listing)
- PLASTIC Packing tape & straps 129 items, up from 47 items in Wave 81 (175% increase)
- GLASS Other glass 194 items, up from 113 items in Wave 81 (72% increase)
- PLASTIC Other plastic 985 items, up from 925 items in Wave 81 (7% increase)
- PLASTIC Bags heavier glossy typically branded carry bags 62 items, up from 5 items in Wave 81 (1140% increase)
- PLASTIC Plastic bottle tops 283 items, up from 229 items in Wave 81 (24% increase)
- PLASTIC Styrene foam boxes, sheets, etc. 88 items, up from 40 items in Wave 81 (120% increase)
- PAPER/PAPERBOARD Other cups/take away containers 172 items, up from 126 items in Wave 81 (37% increase)
- PAPER/PAPERBOARD Shopper dockets & related shopping paper (e.g. lists) 103 items,
 up from 59 items in Wave 81 (75% increase)

Litter types that experienced larger decreases in the number of items in Wave 82 included:

- PAPER/PAPERBOARD Other paper (including tissues) 1,455 items, down from 1,632 items in Wave 81 (11% decrease)
- METAL Metal bottle tops and can pull rings 236 items, down from 312 items in Wave 81 (24% decrease)

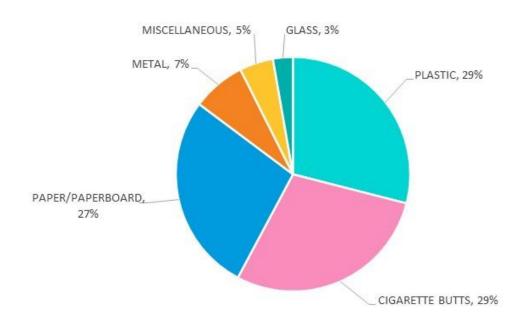


- CIGARETTE BUTTS Cigarette butts 2,512 items, down from 2,550 items in Wave 81 (2% decrease)
- METAL Foil take away 12 items, down from 39 items in Wave 81 (69% decrease)
- PAPER/PAPERBOARD Newspapers & magazines 12 items, down from 29 items in Wave 81 (59% decrease)
- PAPER/PAPERBOARD Tickets, e.g. bus, ATM, vending machine etc. 2 items, down from 13 items in Wave 81 (85% decrease)
- PLASTIC Bread bag tags 7 items, down from 17 items in Wave 81 (59% decrease)

Cigarette butts (29%, down from 33% in Wave 81) and plastic items (29%, up from 24% in Wave 81) accounted for the largest proportions of litter items counted in Wave 82. Other material types represented the following proportions:

- Paper/ paperboard (27%, down from 29% in Wave 81)
- Metal items (7%, down from 9% in Wave 81)
- Glass items (3%, up from 2% in Wave 81)
- Miscellaneous items (5%, up from 3% in Wave 81)

Items as Proportions of Total by Material Type



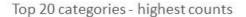


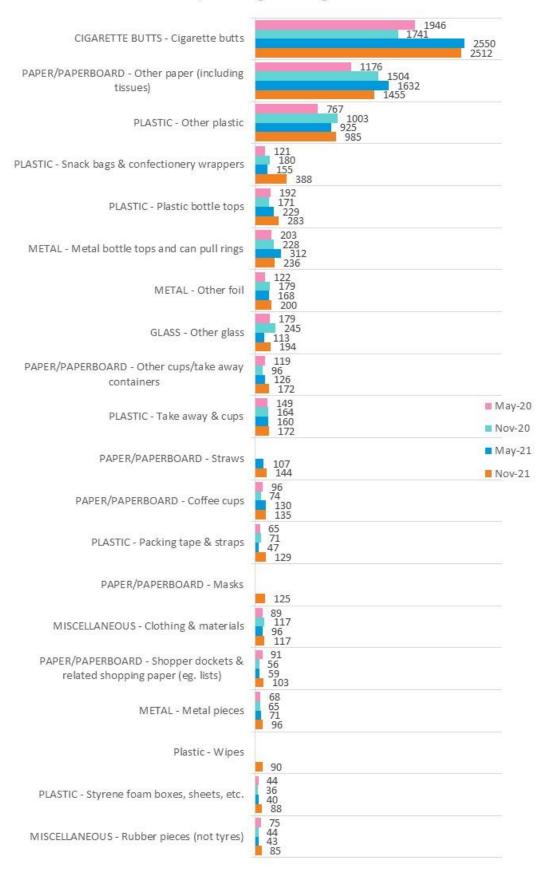
The top 20 ranking of litter type by number of items in Wave 82 was similar to the results for Wave 81, with new items entering the Top 20:

- PAPER/PAPERBOARD Masks
- PLASTIC Wipes
- PLASTIC Styrene foam boxes, sheets etc.
- MISCELLANEOUS rubber pieces (not tyres)

With new entrants, there are always those items that exit from the top 20 item list, in Wave 82 these items were:

- PAPER/PAPERBOARD Cigarette packs
- PAPER/PAPERBOARD Packages & boxes
- PLASTIC Straws
- PLASTIC Lollipop sticks







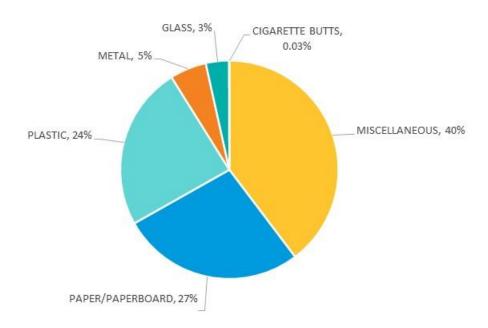
Litter Volume

The total volume of litter recorded in November 2021 amounted to 0.933 cubic metres, higher than the estimated litter volume of May 2020 (0.822m³) and November 2020 (0.611m³) conducted at the same time in the previous year.

The largest proportion of litter volume for Wave 82 was contributed by miscellaneous items (40%, down from 28% in Wave 81). Other material types represented the following proportions of the total volume of litter items counted:

- Paper Items (27%, down from 29% in Wave 81).
- Plastic items (24%, down from 32% in Wave 81)
- Metal (5%, down from 8% in Wave 81)
- Glass (3%, unchanged from 3% in Wave 81)
- Cigarette butts (<1%, unchanged from Wave 81)

Litter Volume as a Proportion of Total Volume



MISCELLANEOUS - Illegal dumping accounted for the highest volume of litter in Wave 82, with an estimated volume of 0.336m³ (up from 0.216m³ in Wave 81). Other items associated with large estimated litter volumes in Wave 82 included:

- PAPER/PAPERBOARD Other cups/take away containers 0.125m³ (up from 0.092m³ in Wave 81)
- PAPER/PAPERBOARD Coffee cups 0.066m³ (up from 0.064m³ in Wave 81)



- PLASTIC Containers, domestic type 0.058m³ (down from 0.075m³ in Wave 81)
- PLASTIC Containers, industrial e.g. oil 0.045m³ (down from 0.067m³ in Wave 81)
- PLASTIC Take away & cups 0.036m³ (down from 0.033m³ in Wave 81)
- PLASTIC Plain water (carbonated or non-carb), <1 litre 0.024m³ (up from 0.014m³ in Wave 81)
- METAL Flav. water/soft drink, (carbonated), all sizes 0.022m³ (up from 0.017m³ in Wave 81)
- MISCELLANEOUS Construction materials 0.021m³ (up from 0.008m³ in Wave 81)
- PAPER/PAPERBOARD Cigarette packets 0.015m³ (up from 0.013m³ in Wave 81)
- PAPER/PAPERBOARD Newspapers & magazines 0.014m³ (down from 0.034m³ in Wave 81)

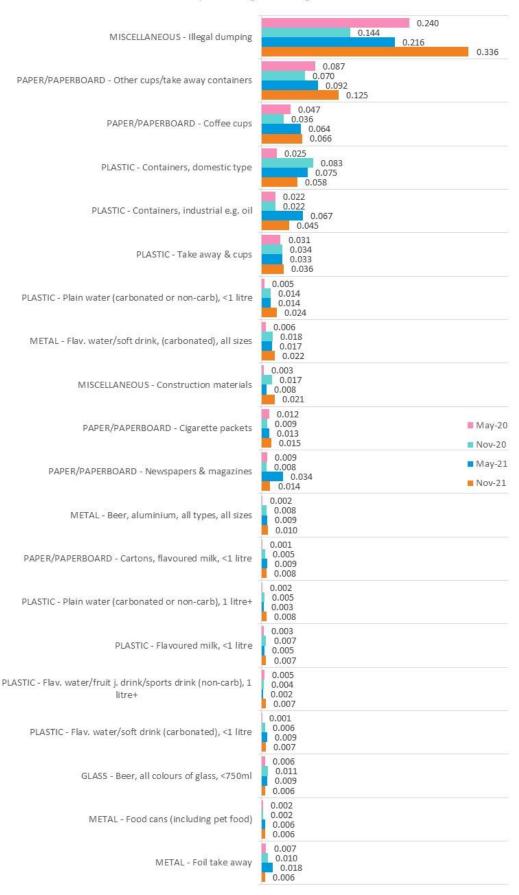
The top 20 ranking of litter items by volume in Wave 82 was similar to the results for Wave 81, with 4 new items entering the Top 20. These items were:

- PLASTIC Plain water (carbonated or non-carbonated), 1 litre +
- PLASTIC Flavoured water/ soft drink (non carbonated), 1 litre +
- PLASTIC Flavoured milk <1 litre
- METAL Food cans (including per food)

With new entrants, there are always those items that exit from the top 20 volume list, in Wave 82 the following items were removed:

- PLASTIC Flavoured water/ soft drink (carbonated), 1 litre +
- PLASTIC Fruit juice 1 litre +
- GLASS Beer, all colours of glass, 750ml+
- PLASTIC White milk, all sizes

Top 20 categories - highest volumes





3.1 Glass

<u>Items</u>

A total of 240 glass litter items (up from 154 items in Wave 81) were counted during Wave 82. The most frequently recorded glass items included:

- Other glass (194 items, up from 113 items in Wave 81)
- Beer, all colours of glass <750ml (13 items, down from 20 items in Wave 81)
- Beer, all colours of glass 750ml+ (6 items, down from 9 items in Wave 81)
- Flavoured water / fruit juice drink / sports drink (non-carb) (8 items, up from nil items in Wave 81)
- Alcoholic sodas / spirit-based mixers (4 items, up from 2 items in Wave 81)
- Plain water (carbonated or non-carbonated), < 1 litre (4 items, unchanged from 4 items in Wave 81)
- Wine & spirits, all sizes (4 items, up from 3 items in Wave 81)

Glass Count

	November 2021	May 2021	November 2020	May 2020
GLASS - Other glass	194 ↑72%	113 ↓-54%	245 ↑37%	179
GLASS - Beer, all colours of glass, <750ml	13 ↓-35%	20 ↓-13%	23 ↑77%	13
GLASS - Flav. water/fruit j. drink/sports drink (non-carb), <1 litre	8			
GLASS - Beer, all colours of glass, 750ml+	6 ↓-33%	9		6
GLASS - Alcoholic sodas/spirit-based mixers, all sizes	4 ↑100%	2 ↓-60%	5	
GLASS - Plain water (carbonated or non-carb), <1 litre	4 - 0%	4 ↓-73%	15 ↑650%	2
GLASS - Wine & spirit, all sizes	4 ↑33%	3 ↑50%	2 ↓-33%	3



Volume

Glass litter items accounted for 0.032m³ (up from 0.028m³ in Wave 81) in estimated litter volume during Wave 82. Glass items which contributed the largest volumes to the total included:

- Beer, all colours of glass <750ml (0.006m³, down from 0.009m³ in Wave 81)
- Beer, all colours of glass 750ml+ (0.005m³, down from 0.008m³ in Wave 81)
- Flavoured water / fruit juice drink / sports drink (non-carbonated), < 1 litre (0.004m³, up from nil in Wave 81)
- Other glass (0.004m³, up from 0.002m³ in Wave 81)
- Wine & spirits, all sizes (0.004m³, up from 0.003m³ in Wave 81)

Glass Volume

	November 2021	May 2021	November 2020	May 2020
GLASS - Beer, all colours of glass, <750ml	0.006018 ↓-0.350	0.009258 ↓-0.130	0.010647 ↑0.769	0.006018
GLASS - Beer, all colours of glass, 750ml+	0.005444 ↓-0.333	0.008166		0.005444
GLASS - Flav. water/fruit j. drink/sports drink (non-carb), <1 litre	0.004434			
GLASS - Other glass	0.003810 ↑0.717	0.002219 ↓-0.539	0.004812 ↑0.369	0.003516
GLASS - Wine & spirit, all sizes	0.003566 ↑0.333	0.002674 ↑0.500	0.001783 ↓-0.333	0.002674



3.2 Metal

<u>Items</u>

A total of 643 metal litter items (down from 698 items in Wave 81) were counted during Wave 82. The most frequently counted metal litter items included:

- Metal bottle tops and can pull rings (236 items, down from 312 items in Wave 81)
- Other foil (200 items, up from 168 items in Wave 81)
- Metal pieces (96 items, up from 71 items in Wave 81)
- Flavoured water/soft drink (carb), all sizes (51 items, up from 39 items in Wave 81)
- Beer, aluminium, all types (23 items, up from 20 items in Wave 81)

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Metal Count

	November 2021	May 2021	November 2020	May 2020
METAL - Metal bottle tops and can pull rings	236 ↓-24%	312 ↑37%	228 ↑12%	203
METAL - Other foil	200 ↑19%	168 ↓-6%	179 ↑47%	122
METAL - Metal pieces	96 ↑35%	71 ↑9%	65 ↓-4%	68
METAL - Flav. water/soft drink, (carbonated), all sizes	51 ↑31%	39 ↓-7%	42 ↑180%	15
METAL - Beer, aluminium, all types, all sizes	23 ↑15%	20 ↑11%	18 ↑350%	4



Volume

Metal litter items accounted for a total estimated litter volume of 0.051m^3 (down from 0.065m^3 in Wave 81). The metal items associated with the largest estimated volumes of litter during Wave 82 included:

- Flavoured water/soft drink (carbonated), all sizes (0.022m³, up from 0.017m³ in Wave 81)
- Beer, aluminium cans, all types, all sizes (0.010m³, up from 0.009m³ in Wave 81)
- Food cans (including per food) (0.006m³, up unchanged from 0.006m³ in Wave 81)
- Foil takeaway (0.006m³, down from 0.018m³ in Wave 81)
- Alcoholic sodas & spirit-based mixers (0.005m³, unchanged from 0.005m³ in Wave 81)

Metal Volume

	November 2021	May 2021	November 2020	May 2020
METAL - Flav. water/soft drink, (carbonated), all sizes	0.02170 ↑0.308	0.01660 ↓-0.071	0.01787 ↑1.800	0.00638
METAL - Beer, aluminium, all types, all sizes	0.00992 ↑0.150	0.00863 ↑0.111	0.00777 ↑3.500	0.00173
METAL - Food cans (including pet food)	0.00557 -0.000	0.00557 ↑1.400	0.00232 -0.000	0.00232
METAL - Foil take away	0.00555 ↓-0.692	0.01803 ↑0.773	0.01017 ↑0.375	0.00740
METAL - Alcoholic sodas & spirit-based mixers	0.00475 ↓-0.083	0.00518 ↑0.091	0.00475 ↑0.375	0.00345



3.3 Plastic

<u>Items</u>

A total of 2,527 plastic litter items (up from 1,870 items in Wave 81) were counted during Wave 82. The most frequently counted plastic litter items included:

- Other plastic (985 items, up from 925 items in Wave 8i1)
- Snack bags & confectionery wrappers (388 items, up from 155 items in Wave 81)
- Plastic bottle tops (283 items, up from 229 items in Wave 81)
- Take away & cups (172 items, up from 160 items in Wave 81)
- Packaging tape & straps (129 items, up from 47 items in Wave 81)

Plastic Count

	November 2021	May 2021	November 2020	May 2020
PLASTIC - Other plastic	985 ↑ 6%	925 ↓-8%	1,003 ↑31%	767
PLASTIC - Snack bags & confectionery wrappers	388 ↑150%	155 ↓-14%	180 ↑49%	121
PLASTIC - Plastic bottle tops	283 ↑24%	229 ↑34%	171 ↓-11%	192
PLASTIC - Take away & cups	172 ↑8%	160 ↓-2%	164 ↑10%	149
PLASTIC - Packing tape & straps	129 ↑174%	47 ↓-34%	71 ↑9%	65



Volume

Plastic items were associated with an estimated litter volume of 0.226m³ (down from 0.260m³ in Wave 81). Items which represented the largest volumes within the Wave 82 litter count included:

- Containers, domestic type (0.058m³, down from 0.075m³ in Wave 81)
- Containers, industrial type (0.045m³, up from 0.067 m³ in Wave 81)
- Take away & cups (0.036m³, up from 0.033m³ in Wave 81)
- Plain water (carbonated or non-carbonated), < 1 litre (0.024m³, up from 0.014 m³ in Wave 81)
- Plain water (carbonated or non-carbonated), 1+ litre (0.008m³, up from 0.003 m³ in Wave 81)

Plastic Volume

	November 2021	May 2021	November 2020	May 2020
PLASTIC - Containers, domestic type	0.05827 ↓-0.222	0.07492 ↓-0.100	0.08324 ↑2.333	0.02497
PLASTIC - Containers, industrial e.g. oil	0.04492 ↓-0.333	0.06737 ↑2.000	0.02246 -0.000	0.02246
PLASTIC - Take away & cups	0.03561 ↑0.075	0.03312 ↓-0.024	0.03395 ↑0.101	0.03085
PLASTIC - Plain water (carbonated or non-carb), <1 litre	0.02442 ↑0.722	0.01418 ↓0.000	0.01418 ↑2.000	0.00473
PLASTIC - Plain water (carbonated or non-carb), 1 litre+	0.00771 ↑1.500	0.00308 ↓-0.333	0.00462 ↑2.000	0.00154



3.4 Paper/ Paperboard

<u>Items</u>

A total of 2,388 paper/paperboard litter items (up from 2.305 items in Wave 81) were recorded during Wave 82.

The most frequently identified items within this material type were:

- Other paper including tissues (1,455 items, down from 1,632 items in Wave 81)
- Other cups/ take away containers (172 items, up from 126 items in Wave 81)
- Straws (new category) (447 items, up from 107 items in Wave 81)
- Coffee cups (135 items, up from 130 items in Wave 81)
- Masks (125 items, up from nil items in Wave 81)

Paper/paperboard Count

	November 2021	May 2021	November 2020	May 2020
PAPER/PAPERBOARD - Other paper (including tissues)	1,455 ↓-11%	1,632 ↑9%	1,504 ↑ 28%	1,176
PAPER/PAPERBOARD - Other cups/take away containers	172 ↑37%	126 ↑31%	96 ↓-19%	119
PAPER/PAPERBOARD - Straws	144 ↑35%	107		
PAPER/PAPERBOARD - Coffee cups	135 ↑4%	130 ↑ 76%	74 ↓-23%	96
PAPER/PAPERBOARD - Masks	125			



Volume

Paper/ Paperboard items accounted for 0.253m³ in estimated litter volume (up from 0.238m³ in Wave 81) in November 2021.

Paper/ paperboard items which contributed the largest volumes to the total included:

- Other cups/take away containers (0.125m³, up from 0.092m³ in Wave 81)
- Coffee cups (0.066m³, up from 0.064m³ in Wave 81)
- Cigarette packets (0.016m³, up from 0.013m³ in Wave 81)
- Newspapers & magazines (0.014m³, down from 0.034m³ in Wave 81)
- Cartons, flavoured milk, < 1litre (0.008m³, down from 0.009m³ in Wave 81)

Paper/paperboard Volume

	November 2021	May 2021	November 2020	May 2020
PAPER/PAPERBOARD - Other cups/take away containers	0.1254 ↑0.365	0.0918 ↑0.313	0.0700 ↓-0.193	0.0867
PAPER/PAPERBOARD -	0.0662	0.0637	0.0363	0.0470
Coffee cups	↑0.038	↑0.757	↓-0.229	
PAPER/PAPERBOARD -	0.0155	0.0126	0.0094	0.0120
Cigarette packets	↑0.224	↑0.349	↓-0.218	
PAPER/PAPERBOARD -	0.0142	0.0342	0.0083	0.0094
Newspapers & magazines	↓-0.586	↑3.143	↓-0.125	
PAPER/PAPERBOARD - Cartons, flavoured milk, <1 litre	0.0081 ↓-0.077	0.0087 ↑0.625	0.0054 ↑3.000	0.0013



3.5 Miscellaneous

<u>Items</u>

A total of 406 miscellaneous items (up from 253 items in Wave 81) were counted during Wave 82.

The most frequently recorded items included:

- Clothing & materials (117 items, up from 96 items in Wave 81)
- Rubber pieces not tyres (85 items, up from 43 items in Wave 81) Rubber pieces in this category include vehicle rubber mouldings, hose pipes and tubing, bicycle handlebar grips and casings, pram mouldings and strips.
- Other miscellaneous (81 items, up from 40 items in Wave 81)
- Construction materials (58 items, up from 22 items in Wave 81)
- Ice cream sticks (27 items, up from 21 items in Wave 81)

Miscellaneous Count

	November 2021	May 2021	November 2020	May 2020
MISCELLANEOUS - Clothing	117	96	117	89
& materials	↑22%	↓-18%	↑31%	
MISCELLANEOUS - Rubber pieces (not tyres)	85 ↑98%	43 ↓-2%	44 ↓-41%	75
MISCELLANEOUS - Other miscellaneous	81 ↑103%	40 ↓-44%	71 ↑109%	34
MISCELLANEOUS -	58	22	48	9
Construction materials	↑164%	↓-54%	↑ 433%	
MISCELLANEOUS - Ice	27	21	30	11
cream sticks	↑29%	↓-30%	↑173%	



Volume

Miscellaneous litter was associated with an estimated litter volume of 0.370m³ up from 0.231m³ in Wave 81) during Wave 82.

Illegal dumping remained the major contributor to the total volume of miscellaneous items, with an estimated total volume of 0.336m³ (up from 0.216m³ in Wave 81).

Other miscellaneous items which contributed to the litter stream volume included:

- Construction materials (0.021m³, up from 0.008m³ in Wave 81)
- Disposable nappies (0.007m³, up from 0.002m³ in Wave 81)
- Tyres & pieces (0.004m³, up from 0.003m³ in Wave 81)
- Clothing and materials (0.002m³, up from 0.001m³ in Wave 81)

Miscellaneous Volume

	November 2021	May 2021	November 2020	May 2020
MISCELLANEOUS - Illegal dumping	0.3360 ↑0.556	0.2160 ↑0.500	0.1440 ↓-0.400	0.2400
MISCELLANEOUS -	0.0209	0.0079	0.0173	0.0032
Construction materials	↑1.636	↓-0.542	↑4.333	
MISCELLANEOUS -	0.0068	0.0023	0.0011	0.0023
Disposable nappies	↑2.000	↑1.000	↓-0.500	
MISCELLANEOUS - Tyres & pieces	0.0038 ↑0.214	0.0032 ↓-0.333	0.0047 ↑ 0.050	0.0045
MISCELLANEOUS - Clothing	0.0018	0.0015	0.0018	0.0014
& materials	↑0.219	↓-0.179	↑0.315	



3.6 Cigarette Butts

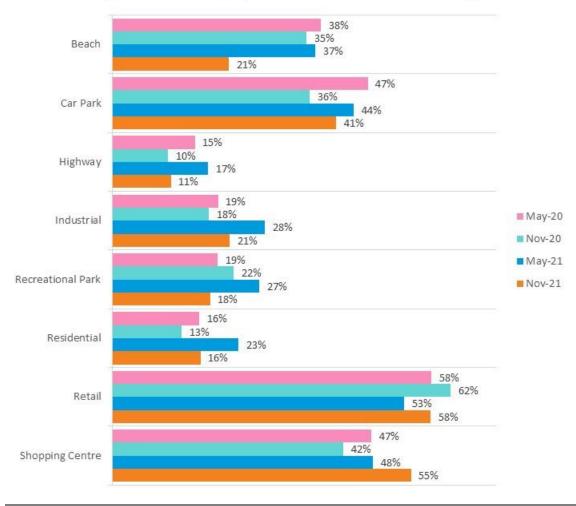
Items

The total number of cigarette butts recorded during Wave 82 was 2,512, down from 2,550 in Wave 81 and 1,741 in Wave 80 at the same time the previous year.

The proportion of cigarette butts against the total number of litter items was highest at retail sites (58%, up from 53% in Wave 81). Cigarette butts also contributed the following proportions of total litter at the following site types:

- Shopping centres (55%, up from 48% in Wave 81)
- Car parks (41%, down from 44% in Wave 81)
- Beaches (21%, down from 37% in Wave 81)
- Industrial sites (21%, down from 28% in Wave 81)
- Recreational parks (18%, down from 27% in Wave 81)
- Residential sites (16%, down from 23% in Wave 81)
- Highway sites (11%, down from 17% in Wave 81)

Cigarette butts as a proportion of total litter at each site type





<u>Volume</u>

Despite cigarette butts being the most numerous type of litter item, they accounted for less than 1% of the total volume of litter recorded during the current Wave.



3.7 Dispersion of Litter by Site Type

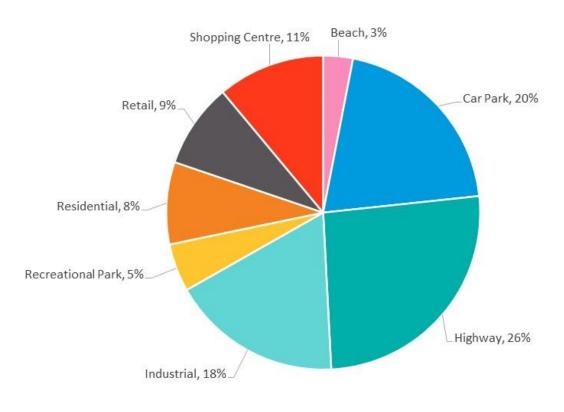
<u>Items</u>

Highways remained the most significant contributor to the total number of litter items counted in November 2021 with 26% (down from 31% in Wave 81) of the total litter items counted at highway locations.

Other sites contributed the following proportions of the total number of litter items counted during Wave 82:

- Car Park (20%, down from 23% in Wave 81)
- Industrial (18%, up from 14% in Wave 81)
- Shopping Centre (11%, up from 10% in Wave 81)
- Retail (9%, unchanged from 9% in from Wave 81)
- Residential (8%, up from 7% in Wave 81)
- Recreational Park (5%, unchanged from 5% in Wave 81)
- Beach (3%, up from 1% from Wave 81)

Proportion of total litter items counted within site type





A comparison of the proportions of litter items found at each site type revealed that highway and car park locations contributed large amounts to the total number of litter items in the November Monitor, based on the proportion of the number of these sites as outlined below:

- Highway sites represented only 18% of the total number of sites surveyed and contributed 26% (down from 31% in Wave 81) of the total litter items counted in Wave 82.
- Car parks incorporated 15% of the sites surveyed and contributed 20% (down from 23% in Wave 81) of the litter items counted in Wave 82.

Conversely, residential locations, beaches and recreational parks contributed smaller proportions of litter items to the total litter count than anticipated based upon the proportion of these sites within the overall sample of locations as detailed below:

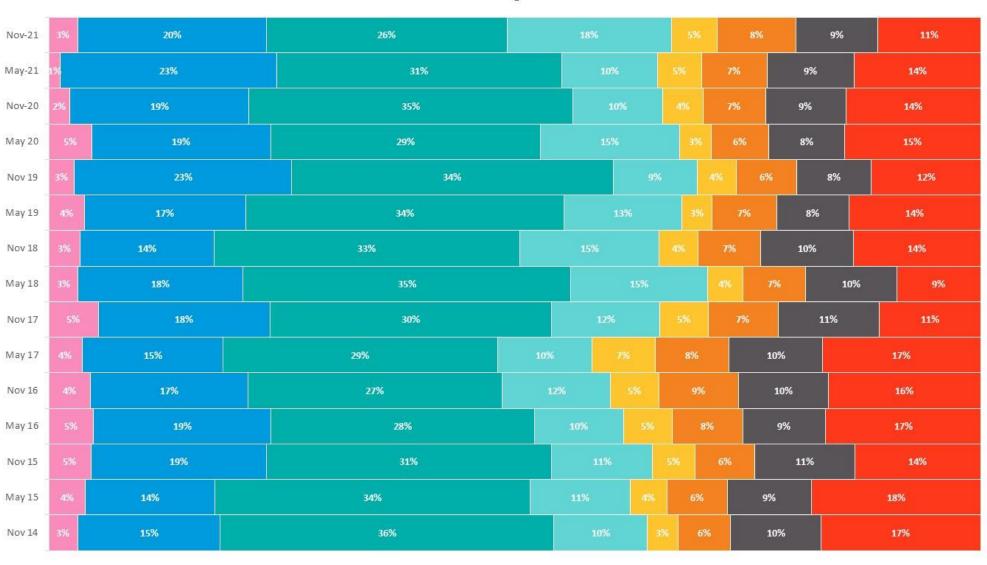
- Residential areas incorporated 17% of the sites surveyed but contributed only 8% (up from 7% in Wave 81) of the litter items counted in Wave 82.
- Beaches represented 11% of the sites surveyed but contributed only 3% (up from 1% in Wave 81) of the litter counted in Wave 82.
- Recreational Parks represented 9% of sites surveyed and contributed 5% (unchanged from 5% in Wave 81) of the litter counted in Wave 82.

The remaining sites contributed around the expected proportions of litter based on the proportion of these sites among the overall number of sites counted during November 2021, the proportions were:

- Industrial sites incorporated 11% of the sites surveyed and contributed 18% (up from 14% in Wave 81) of the total litter items counted in Wave 82.
- Shopping centres incorporated 9% of the sites surveyed and contributed 11% (up from 10% in Wave 81) of the litter items counted in Wave 82.
- Retail areas incorporated 10% of the sites surveyed and contributed 9% (unchanged from 9% in Wave 81) of the litter items counted in Wave 82.



PROPORTION OF TOTAL LITTER ITEMS COUNTED WITHIN SITE TYPE - tracking -



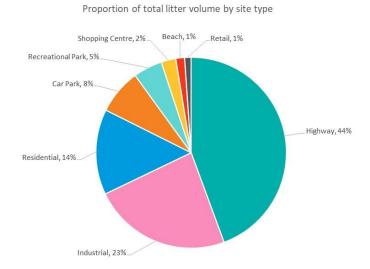
■ Beach ■ Car Park ■ Highway ■ Shopping Centre ■ Recreational Park ■ Residential ■ Retail ■ Industrial



Volume

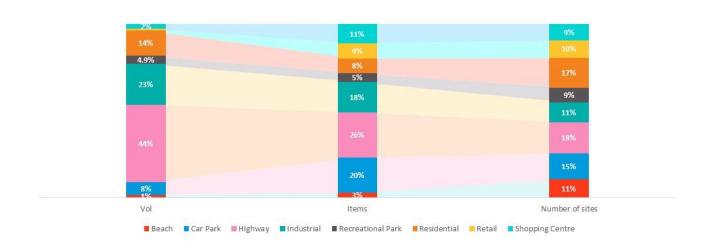
Almost half of the total volume of litter estimated during Wave 82 (44%, up from 34% in Wave 81) was associated with litter items at highway sites. While almost one quarter (23%, down from 37% in Wave 81) was associated with litter items at industrial sites.

Lower volumes of litter were contributed by residential sites (14%, up from 6% in Wave 81), car park sites (8%, down from 16% in Wave 81), recreational parks (5%, up from 0.4% in Wave 81), shopping centres (2%, down from 3% in Wave 81, retail sites (1%, down from 3% in Wave 81) and beaches (1%, unchanged from 1% in Wave 81) during Wave 82.



A comparison of the litter volume, number of litter items and proportion of sites represented within location types shows that highway locations and industrial sites contributed a larger number and volume of litter items than would be expected given their representations within the sample.

NUMBER AND VOLUME OF LITTER BY SITE TYPE AS PROPORTIONS OF TOTALS





3.8 CDL Beverage Containers

The majority (97%, unchanged from 97% in Wave 81) of litter items counted in November 2021 were non-beverage items.

The total number of CDL beverage containers counted was 229 items, up from 195 items in Wave 81.

CDL beverage containers accounted for 96% (up from 87% in Wave 81) of all beverage containers counted during Wave 82.



Data Summary - Items



		Items											
KESAB - Litter Strategy Monitoring Wave 82 - November 2021		ВЕАСН	CAR PARK	НІБНWAY	INDUSTRIAL	RECREATIONAL PARK	RESIDENTIAL	RETAIL	SHOPPING CENTRE	METROPOLITAN	REGIONAL	TOTALITEMS	
CIGARET	TE BUTTS	NBEV	57	721	241	329	77	119	442	526	2094	418	2512
	Alcoholic sodas/spirit-based mixers, all sizes	CDL	1	0	2	1	0	0	0	0	2	2	4
	Beer, all colours of glass, <750ml	CDL	0	2	2	8	0	1	0	0	9	4	13
	Beer, all colours of glass, 750ml+	CDL	0	1	5	0	0	0	0	0	3	3	6
	Cider/fruit based etc.	CDL	0	0	0	0	0	0	0	0	0	0	0
	Flav. water/fruit j. drink/sports drink (non-carb), <1 litre	CDL	0	0	5	1	0	0	2	0	5	3	8
	Flav. water/fruit j. drink/sports drink (non-carb), 1 litre+	CDL	0	0	1	0	0	0	0	0	0	1	1
ဟ	Flav. water/soft drink (carbonated), <1 litre	CDL	1	0	1	0	0	0	0	0	0	2	2
GLAS	Flav. water/soft drink (carbonated), 1 litre+	CDL	0	0	0	0	0	0	0	0	0	0	0
📜	Fruit juice, <1 litre	CDL	0	0	0	0	2	0	0	0	0	2	2
O	Fruit juice, 1 litre+	BEV	0	0	0	0	0	0	0	0	0	0	0
	Other glass	NBEV	1	25	113	33	1	9	6	6	131	63	194
	Plain water (carbonated or non-carb), <1 litre	CDL	0	0	2	2	0	0	0	0	0	4	4
	Plain water (carbonated or non-carb), 1 litre+	CDL	0	0	2	0	0	0	0	0	0	2	2
	Wine & spirit, all sizes	BEV	0	2	2	0	0	0	0	0	4	0	4
	Wine cooler, all sizes	CDL	0	0	0	0	0	0	0	0	0	0	0
	TOTAL		3	30	135	45	3	10	8	6	154	86	240
	Aerosols - pressure packs	NBEV	0	0	0	0	0	0	0	0	0	0	0
	Alcoholic sodas & spirit-based mixers	CDL	2	0	7	1	1	0	0	0	7	4	11
	Beer, aluminium, all types, all sizes	CDL	0	1	17	4	0	1	0	0	11	12	23
	Cider/fruit based etc.	CDL	0	0	0	0	0	1	0	0	1	0	1
	Flav. water/soft drink, (carbonated), all sizes	CDL	6	4	28	8	0	3	0	2	43	8	51
7	Flav. water/soft drink, (non-carb), all sizes	CDL	0	1	0	0	0	0	0	0	1	0	1
METAL	Foil take away	NBEV	2	1	7	2	0	0	0	0	4	8	12
₩	Food cans (including pet food)	NBEV	0	1	9	1	0	1	0	0	11	1	12
_	Industrial cans - all types	NBEV	0	0	0	0	0	0	0	0	0	0	0
	Metal bottle tops and can pull rings	NBEV	5	49	91	47	7	15	8	14	198	38	236
	Metal pieces	NBEV	0	8	32	34	1	16	3	2	84	12	96
	Other foil	NBEV	2	43	69	34	14	23	4	11	161	39	200
	TOTAL		17	108	260	131	23	60	15	29	521	122	643



								Items					
	KESAB - Litter Strategy Monitoring Wave 82 - November 2021		ВЕАСН	CAR PARK	НІБНWAY	INDUSTRIAL	RECREATIONAL PARK	RESIDENTIAL	RETAIL	SHOPPING CENTRE	METROPOLITAN	REGIONAL	TOTAL ITEMS
	Clothing & materials	NBEV	3	19	54	14	6	12	6	3	89	28	117
ဟ	Condoms	NBEV	0	0	0	1	0	0	0	0	1	0	1
l S	Construction materials	NBEV	0	3	24	21	0	10	0	0	52	6	58
PAPER/PAPERBOARD MISCELLANEOUS	Disposable nappies	NBEV	0	1	2	1	0	2	0	0	2	4	6
Z	Ice cream sticks	NBEV	4	6	5	1	5	1	4	1	13	14	27
	Illegal dumping	NBEV	0	1	3	5	1	4	0	0	13	1	14
	Other miscellaneous	NBEV	7	9	7	27	3	21	2	5	76	5	81
<u>ប</u> ្ជ	Rubber pieces (not tyres)	NBEV	6	12	29	19	4	9	6	0	79	6	85
	Syringes	NBEV	0	0	0	0	0	0	0	0	0	0	0
_	Tyres & pieces	NBEV	0	0	15	2	0	0	0	0	10	7	17
	TOTAL		20	51	139	91	19	59	18	9	335	28 0 6 4 14 1 5 6 0 7 71 1 0 2 0 1 14 36 36 1 0 6 29 3 33 168 17 15 5	406
	Cartons, flavoured milk, <1 litre	CDL	1	1	8	2	0	0	0	0	11	1	12
	Cartons, flavoured milk, 1 litre+	BEV	0	0	0	0	0	0	0	0	0	0	0
	Cartons, fruit juice, <1 litre	CDL	0	0	0	0	6	0	1	0	5	2	7
	Cartons, fruit juice, 1 litre+	BEV	0	0	0	0	0	0	0	0	0	28 0 6 4 14 1 5 6 0 7 71 1 0 2 0 1 14 36 36 1 0 6 29 3 33 168 17 15 5 9	0
	Cartons, milk, plain (white), all sizes	BEV	0	0	1	1	0	0	0	0	1	1	2
	Cigarette packets	NBEV	0	7	21	29	1	8	1	4	57	14	71
<u>~</u>	Cups/take away containers	NBEV	3	14	93	30	15	12	1	4	136	36	172
8	Coffee cups	NBEV	0	16	78	23	2	1	1	14	99	36	135
ı Ö	Flav. water/fruit j. drink/sports drink (non-carb), <1 litre	CDL	0	0	2	0	0	0	0	0	1	1	2
16	Flav. water/fruit j. drink/sports drink (non-carb), 1 litre+	CDL	0	0	0	0	0	0	0	0	0	0	0
♣	Ice cream wrappers	NBEV	0	1	5	0	1	1	2	1	5	6	11
<u></u>	Junk mail/free circulars	NBEV	0	3	5	21	0	9	0	0	9	29	38
<u> 22</u>	Newspapers & magazines	NBEV	0	1	4	5	1	1	0	0	9	3	12
	Masks	NBEV	1	43	32	19	4	9	7	10	92	33	125
Α	Other paper (including tissues)	NBEV	42	291	348	238	97	171	137	131	1287	168	1455
"	Straws	NBEV	6	40	32	12	16	18	5	15	127		144
	Packages & boxes	NBEV	3	5	26	8	0	2	0	2	31		46
	Paper bags	NBEV	1	3	17	11	3	6	5	5	46	5	51
	Shopper dockets & related shopping paper (eg. lists)	NBEV	0	35	2	7	1	15	15	28	94	9	103
	Tickets, e.g. bus, ATM, vending machine etc.	NBEV	1	0	0	0	0	1	0	0	2	_	2
	TOTAL		58	460	674	406	147	254	175	214	2012	376	2388



		T						Items					
	KESAB - Litter Strategy Monitoring Wave 82 - November 2021		ВЕАСН	CAR PARK	НІБНWAY	INDUSTRIAL	RECREATIONAL PARK	RESIDENTIAL	RETAIL	SHOPPING CENTRE	METROPOLITAN	REGIONAL	TOTALITEMS
	6 ring can holders	NBEV	0	0	0	1	0	0	0	0	0	1	1
	Bags - heavier glossy typically branded carry bags	NBEV	0	4	22	20	1	2	12	1	55	7	62
	Bags - supermarket type light weight carry bags	NBEV	0	1	25	2	4	0	1	0	10	23	33
	Bread bag tags	NBEV	0	0	0	1	4	0	0	2	0	7	7
	Containers, domestic type	NBEV	0	0	5	1	0	1	0	0	7	0	7
	Containers, industrial e.g. oil	NBEV	0	0	2	0	0	0	0	0	1	1	2
	Drink pouches	CDL	0	0	1	1	0	0	0	0	1	1	2
	Flav. water/fruit j. drink/sports drink (non-carb), <1 litre	CDL	0	1	4	0	1	0	0	2	8	0	8
	Flav. water/fruit j. drink/sports drink (non-carb), 1 litre+	CDL	0	0	3	1	0	1	1	0	6	0	6
	Flav. water/soft drink (carbonated), <1 litre	CDL	0	0	10	1	0	0	0	0	9	2	11
	Flav. water/soft drink (carbonated), 1 litre+	CDL	0	1	0	0	0	0	0	0	0	1	1
	Flavoured milk, <1 litre	CDL	0	1	13	0	0	0	0	0	13	1	14
	Flavoured milk, 1 litre+	BEV	0	0	1	0	0	0	0	0	1	0	1
U	Fruit juice, <1 litre	CDL	0	0	0	0	0	0	0	1	1	0	1
l Ĕ	Fruit juice, 1 litre+	BEV	0	0	1	0	0	0	0	0	1	0	1
PLASTIC	Lollipop sticks	NBEV	5	17	3	5	19	8	2	13	43	29	72
ΙŽ	Other plastic	NBEV	59	148	311	213	37	97	50	70	933	52	985
"	Packing tape & straps	NBEV	1	15	53	33	9	12	4	2	112	17	129
	Plain water (carbonated or non-carb), <1 litre	CDL	3	4	22	2	0	0	0	0	31	0	31
	Plain water (carbonated or non-carb), 1 litre+	CDL	1	0	0	0	0	0	1	3	5	0	5
	Plastic bottle tops	NBEV	20	58	51	82	5	27	2	38	262	21	283
	Sacks - sheeting - other bags	NBEV	2	3	9	5	0	8	3	0	30	0	30
	Snack bags & confectionery wrappers	NBEV	13	65	119	73	52	37	9	20	304	84	388
	Spoons/cutlery	NBEV	2	1	1	5	8	2	0	1	18	2	20
	Straws	NBEV	1	7	30	15	8	5	6	3	39	36	75
	Styrene foam boxes, sheets, etc.	NBEV	0	10	30	18	8	20	2	0	76	12	88
	Take away & cups	NBEV	5	23	76	31	5	6	10	16	149	23	172
	White milk, all sizes	BEV	0	0	1	0	0	1	0	0	2	0	2
	Wine cask bladders	BEV	0	0	0	0	0	0	0	0	0	0	0
	Wipes	NBEV	0	36	12	24	1	9	0	8	81	9	90
	TOTAL		112	395	805	534	162	236	103	180	2198	329	2527
GRAND 1	TOTAL		267	1765	2254	1536	431	738	761	964	7314	1402	8716



Data Summary - Volumes



							Vo	olume - Cubic	Metres				
KESAB - Litter Strategy Monitoring Wave 82 - November 2021			ВЕАСН	CAR PARK	НІСНМАУ	INDUSTRIAL	RECREATIONAL PARK	RESIDENTIAL	RETAIL	SHOPPING CENTRE	METROPOLITAN	REGIONAL	TOTAL VOLUME
CIGARET	TE BUTTS	NBEV	0.000007	0.000083	0.000028	0.000038	0.000009	0.000014	0.000051		0.000241	0.000048	0.000289
	Alcoholic sodas/spirit-based mixers, all sizes	CDL	0.000374	0.000000	0.000749	0.000374	0.000000	0.000000	0.000000		0.000749	0.000749	0.001497
	Beer, all colours of glass, <750ml	CDL	0.000000	0.000926	0.000926	0.003703	0.000000	0.000463	0.000000		0.004166	0.001852	0.006018
	Beer, all colours of glass, 750ml+	CDL	0.000000	0.000907	0.004536	0.000000	0.000000	0.000000	0.000000	0.000000	0.002722	0.002722	0.005444
	Cider/fruit based etc.	CDL	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000
	Flav. water/fruit j. drink/sports drink (non-carb), <1 litre	CDL	0.000000	0.000000	0.002771	0.000554	0.000000	0.000000	0.001109	0.000000	0.002771	0.001663	0.004434
	Flav. water/fruit j. drink/sports drink (non-carb), 1 litre+	CDL	0.000000	0.000000	0.001277	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.001277	0.001277
ဟ	Flav. water/soft drink (carbonated), <1 litre	CDL	0.000396	0.000000	0.000396	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000792	0.000792
AS	Flav. water/soft drink (carbonated), 1 litre+	CDL	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000
J5	Fruit juice, <1 litre	CDL	0.000000	0.000000	0.000000	0.000000	0.000848	0.000000	0.000000	0.000000	0.000000	0.000848	0.000848
O	Fruit juice, 1 litre+	BEV	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000
	Other glass	NBEV	0.000020	0.000491	0.002219	0.000648	0.000020	0.000177	0.000118	0.000118	0.002573	0.001237	0.003810
	Plain water (carbonated or non-carb), <1 litre	CDL	0.000000	0.000000	0.001162	0.001162	0.000000	0.000000	0.000000	0.000000	0.000000	0.002324	0.002324
	Plain water (carbonated or non-carb), 1 litre+	CDL	0.000000	0.000000	0.002119	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000048 0.00 0.000749 0.00 0.001852 0.00 0.002722 0.00 0.000000 0.00 0.001663 0.00 0.001277 0.00 0.000000 0.00 0.00048 0.00 0.0002324 0.00 0.002324 0.00 0.002324 0.00 0.002119 0.00 0.002324 0.00 0.002119 0.00 0.0015582 0.03 0.000000 0.00 0.015582 0.03 0.000000 0.00 0.001726 0.00 0.005177 0.00 0.0003404 0.02 0.003699 0.00 0.003699 0.00 0.000152 0.00 0.000127 0.00 0.000152 0.00 0.000127 0.00 0.000127 0.00 0.000127 0.00 0.000127 0.00	0.002119
	Wine & spirit, all sizes	BEV	0.000000	0.001783	0.001783	0.000000	0.000000	0.000000	0.000000	0.000000	0.003566	0.000000	0.003566
	Wine cooler, all sizes	CDL	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000
	TOTAL		0.000790	0.004107	0.017938	0.006442	0.000868	0.000640	0.001226	0.000118	0.016547	0.015582	0.032129
	Aerosols - pressure packs	NBEV	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000
	Alcoholic sodas & spirit-based mixers	CDL	0.000863	0.000000	0.003020	0.000431	0.000431	0.000000	0.000000	0.000000	0.003020	0.001726	0.004745
	Beer, aluminium, all types, all sizes	CDL	0.000000	0.000431	0.007334	0.001726	0.000000	0.000431	0.000000	0.000000	0.004745	0.005177	0.009922
	Cider/fruit based etc.	CDL	0.000000	0.000000	0.000000	0.000000	0.000000	0.000431	0.000000	0.000000	0.000431	0.000048 0.000 0.000749 0.001 0.001852 0.006 0.002722 0.005 0.000000 0.000 0.001663 0.004 0.001277 0.001 0.000792 0.000 0.000000 0.000 0.000848 0.000 0.000000 0.000 0.001237 0.003 0.002324 0.002 0.002119 0.002 0.002324 0.002 0.002119 0.002 0.0015582 0.032 0.000000 0.000 0.015582 0.032 0.000000 0.000 0.001726 0.004 0.005177 0.009 0.003404 0.021 0.000000 0.000 0.003699 0.005 0.000464 0.005 0.000000 0.000 0.000152 0.000 0.000127 0.001	0.000431
	Flav. water/soft drink, (carbonated), all sizes	CDL	0.002553	0.001702	0.011915	0.003404	0.000000	0.001277	0.000000	00 0.000000 0.000749 0.000749 00 0.000000 0.004166 0.001852 00 0.000000 0.002722 0.002702 00 0.000000 0.000000 0.000000 00 0.000000 0.000000 0.001663 00 0.000000 0.000000 0.000792 00 0.000000 0.000000 0.000000 00 0.000000 0.000000 0.000000 00 0.000000 0.000000 0.000000 00 0.000000 0.000000 0.000000 00 0.000000 0.000000 0.000000 00 0.000000 0.000000 0.0002324 00 0.000000 0.000000 0.0002324 00 0.000000 0.000000 0.000000 00 0.000000 0.000000 0.000000 00 0.000000 0.000000 0.000000 00 0.000000 0.000000 0.000000 00 0.000000 <td>0.003404</td> <td>0.021702</td>	0.003404	0.021702	
+	Flav. water/soft drink, (non-carb), all sizes	CDL	0.000000	0.000382	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000382	0.000000	0.000382
12	Foil take away	NBEV	0.000925	0.000462	0.003237	0.000925	0.000000	0.000000	0.000000	0.000000	0.001850	0.003699	0.005549
METAL	Food cans (including pet food)	NBEV	0.000000	0.000464	0.004174	0.000464	0.000000	0.000464	0.000000	0.000000	0.005102	0.000464	0.005566
-	Industrial cans - all types	NBEV	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000
	Metal bottle tops and can pull rings	NBEV	0.000020	0.000196	0.000364	0.000188	0.000028	0.000060	0.000032	0.000056	0.000792	0.000152	0.000944
	Metal pieces	NBEV	0.000000	0.000085	0.000339	0.000360	0.000011	0.000170	0.000032	0.000021	0.000890	0.000127	0.001018
	Other foil	NBEV	0.000003	0.000067	0.000108	0.000053	0.000022	0.000036	0.000006	0.000017	0.000251	0.000061	0.000312
	TOTAL		0.004364	0.003789	0.030490	0.007551	0.000492	0.002869	0.000070	0.000945	0.035761	0.014810	0.050571



	Volume - Cubic Metres												
	KESAB - Litter Strategy Monitoring Wave 82 - November 2021		ВЕАСН	CAR PARK	НІБНWAY	INDUSTRIAL	RECREATIONAL PARK	RESIDENTIAL	RETAIL	SHOPPING CENTRE	METROPOLITAN	REGIONAL	TOTAL VOLUME
	Clothing & materials	NBEV	0.000046	0.000291	0.000826	0.000214	0.000092	0.000184	0.000092	0.000046	0.001362	0.000428	0.001790
ဟ	Condoms	NBEV	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000
≥	Construction materials	NBEV	0.000000	0.001080	0.008640	0.007560	0.000000	0.003600	0.000000	0.000000	0.018720	0.002160	0.020880
PAPER/PAPERBOARD MISCELLANEOUS PAPER/PAPERBOARD MISCELLANEOUS PAPER/PAPERBOARD	Disposable nappies	NBEV	0.000000	0.001125	0.002250	0.001125	0.000000	0.002250	0.000000	0.000000	0.002250	0.004500	0.006750
	Ice cream sticks	NBEV	0.000004	0.000006	0.000005	0.000001	0.000005	0.000001	0.000004	0.000001	0.000012	0.000013	0.000025
🖰	Illegal dumping	NBEV	0.000000	0.024000	0.072000	0.120000	0.024000	0.096000	0.000000	0.000000	0.312000	0.024000	0.336000
🗖	Other miscellaneous	NBEV	0.000095	0.000122	0.000095	0.000365	0.000041	0.000284	0.000027	0.000068	0.001026	0.000068	0.001094
Ü	Rubber pieces (not tyres)	NBEV	0.000001	0.000002	0.000005	0.000003	0.000001	0.000001	0.000001	0.000000	0.000013	0.000001	0.000014
₩	Syringes	NBEV	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000
	Tyres & pieces	NBEV	0.000000	0.000000	0.003375	0.000450	0.000000	0.000000	0.000000	0.000000	0.002250	0.001575	0.003825
	TOTAL		0.000145	0.026625	0.087195	0.129718	0.024138	0.102320	0.000123	0.000114	0.337633	0.032745	0.370378
	Cartons, flavoured milk, <1 litre	CDL	0.000672	0.000672	0.005380	0.001345	0.000000	0.000000	0.000000	0.000000	0.007397	0.000672	0.008070
	Cartons, flavoured milk, 1 litre+	BEV	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000
	Cartons, fruit juice, <1 litre	CDL	0.000000	0.000000	0.000000	0.000000	0.003749	0.000000	0.000625	0.000000	0.003124	0.001250	0.004373
	Cartons, fruit juice, 1 litre+	BEV	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000
	Cartons, milk, plain (white), all sizes	BEV	0.000000	0.000000	0.001013	0.001013	0.000000	0.000000	0.000000	0.000000	0.001013	0.001013	0.002025
	Cigarette packets	NBEV	0.000000	0.001525	0.004575	0.006318	0.000218	0.001743	0.000218	0.000871	0.012419	0.003050	0.015469
<u> </u>	Cups/take away containers	NBEV	0.002187	0.010205	0.067792	0.021869	0.010934	0.008747	0.000729	0.002916	0.099137	0.026242	0.125379
8	Coffee cups	NBEV	0.000000	0.007840	0.038222	0.011271	0.000980	0.000490	0.000490	0.006860	0.048513	0.017641	0.066153
ĕ	Flav. water/fruit j. drink/sports drink (non-carb), <1 litre	CDL	0.000000	0.000000	0.000605	0.000000	0.000000	0.000000	0.000000	0.000000	0.000302	0.000302	0.000605
"	Flav. water/fruit j. drink/sports drink (non-carb), 1 litre+	CDL	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000
<u> </u>	Ice cream wrappers	NBEV	0.000000	0.000002	0.000012	0.000000	0.000002	0.000002	0.000005	0.000002	0.000012	0.000014	0.000026
4	Junk mail/free circulars	NBEV	0.000000	0.000522	0.000870	0.003654	0.000000	0.001566	0.000000	0.000000	0.001566	0.005046	0.006612
<u> 2</u>	Newspapers & magazines	NBEV	0.000000	0.001180	0.004720	0.005900	0.001180	0.001180	0.000000	0.000000	0.010620	0.003540	0.014160
2	Masks	NBEV	0.000003	0.000145	0.000108	0.000064	0.000014	0.000030	0.000024	0.000034	0.000311	0.000112	0.000423
₹	Other paper (including tissues)	NBEV	0.000142	0.000984	0.001176	0.000804	0.000328	0.000578	0.000463	0.000443	0.004350	0.000568	0.004918
"	Straws	NBEV	0.000025	0.000165	0.000132	0.000050	0.000066	0.000074	0.000021	0.000062	0.000524	0.000070	0.000594
	Packages & boxes	NBEV	0.000240	0.000400	0.002080	0.000640	0.000000	0.000160	0.000000	0.000160	0.002480	0.001200	0.003680
	Paper bags	NBEV	0.000011	0.000032	0.000180	0.000116	0.000032	0.000063	0.000053	0.000053	0.000487	0.000053	0.000540
	Shopper dockets & related shopping paper (eg. lists)	NBEV	0.000000	0.000071	0.000004	0.000014	0.000002	0.000030	0.000030	0.000057	0.000191	0.000018	0.000209
	Tickets, e.g. bus, ATM, vending machine etc.	NBEV	0.000001	0.000000	0.000000	0.000000	0.000000	0.000001	0.000000	0.000000	0.000002	0.000000	0.000002
	TOTAL		0.003281	0.023744	0.126869	0.053058	0.017504	0.014666	0.002657	0.011458	0.192447	0.060791	0.253238



							Vo	lume - Cubic	Metres				
	KESAB - Litter Strategy Monitoring Wave 82 - November 2021			CAR PARK	НІСНWАУ	INDUSTRIAL	RECREATIONAL PARK	RESIDENTIAL	RETAIL	SHOPPING CENTRE	METROPOLITAN	REGIONAL	TOTAL VOLUME
	6 ring can holders	NBEV	0.000000	0.000000	0.000000	0.000002	0.000000	0.000000	0.000000	0.000000	0.000000	0.000002	0.000002
	Bags - heavier glossy typically branded carry bags	NBEV	0.000000	0.000350	0.001927	0.001752	0.000088	0.000175	0.001051	0.000088	0.004818		0.005431
	Bags - supermarket type light weight carry bags	NBEV	0.000000	0.000034	0.000849	0.000068	0.000136	0.000000	0.000034	0.000000	0.000339		0.001120
	Bread bag tags	NBEV	0.000000	0.000000	0.000000	0.000000	0.000001	0.000000	0.000000	0.000000	0.000000		0.000002
	Containers, domestic type	NBEV	0.000000	0.000000	0.041620	0.008324	0.000000	0.008324	0.000000	0.000000	0.058268		0.058268
	Containers, industrial e.g. oil	NBEV	0.000000	0.000000	0.044916	0.000000	0.000000	0.000000	0.000000	0.000000	0.022458		0.044916
	Drink pouches	CDL	0.000000	0.000000	0.000086	0.000086	0.000000	0.000000	0.000000	0.000000	0.000086		0.000173
	Flav. water/fruit j. drink/sports drink (non-carb), <1 litre	CDL	0.000000	0.000738	0.002950	0.000000	0.000738	0.000000	0.000000	0.001475	0.005901		0.005901
	Flav. water/fruit j. drink/sports drink (non-carb), 1 litre+	CDL	0.000000	0.000000	0.003603	0.001201	0.000000	0.001201	0.001201	0.000000	0.007207	0.000000	0.007207
	Flav. water/soft drink (carbonated), <1 litre	CDL	0.000000	0.000000	0.006221	0.000622	0.000000	0.000000	0.000000	0.000000	0.005599	0.001244	0.006843
	Flav. water/soft drink (carbonated), 1 litre+	CDL	0.000000	0.001654	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.001654	0.001654
	Flavoured milk, <1 litre	CDL	0.000000	0.000533	0.006925	0.000000	0.000000	0.000000	0.000000	0.000000	0.006925	0.000533	0.007458
	Flavoured milk, 1 litre+	BEV	0.000000	0.000000	0.002137	0.000000	0.000000	0.000000	0.000000	0.000000	0.002137	0.000000	0.002137
U	Fruit juice, <1 litre	CDL	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000400	0.000400	0.000000	0.000400
JI C	Fruit juice, 1 litre+	BEV	0.000000	0.000000	0.002137	0.000000	0.000000	0.000000	0.000000	0.000000	0.002137	0.000000	0.002137
A S	Lollipop sticks	NBEV	0.000003	0.000009	0.000002	0.000003	0.000010	0.000004	0.000001	0.000007	0.000023	0.000015	0.000038
PLAS	Other plastic	NBEV	0.000074	0.000185	0.000389	0.000266	0.000046	0.000121	0.000063	0.000088	0.001166	0.000065	0.001231
"	Packing tape & straps	NBEV	0.000000	0.000004	0.000014	0.000009	0.000002	0.000003	0.000001	0.000001	0.000030	0.000005	0.000035
	Plain water (carbonated or non-carb), <1 litre	CDL	0.002364	0.003152	0.017334	0.001576	0.000000	0.000000	0.000000	0.000000	0.024425	0.000000	0.024425
	Plain water (carbonated or non-carb), 1 litre+	CDL	0.001542	0.000000	0.000000	0.000000	0.000000	0.000000	0.001542	0.004625	0.007708	0.000000	0.007708
	Plastic bottle tops	NBEV	0.000160	0.000464	0.000408	0.000656	0.000040	0.000216	0.000016	0.000304	0.002097	0.000168	0.002265
	Sacks - sheeting - other bags	NBEV	0.000001	0.000001	0.000003	0.000002	0.000000	0.000003	0.000001	0.000000	0.000009	0.000000	0.000009
	Snack bags & confectionery wrappers	NBEV	0.000102	0.000509	0.000932	0.000572	0.000407	0.000290	0.000070	0.000157	0.002380	0.000658	0.003038
	Spoons/cutlery	NBEV	0.000019	0.000010	0.000010	0.000048	0.000077	0.000019	0.000000	0.000010	0.000173	0.000019	0.000192
	Straws	NBEV	0.000004	0.000029	0.000124	0.000062	0.000033	0.000021	0.000025	0.000012	0.000161	0.000149	0.000309
	Styrene foam boxes, sheets, etc.	NBEV	0.000000	0.000375	0.001125	0.000675	0.000300	0.000750	0.000075	0.000000	0.002850	0.000450	0.003300
	Take away & cups	NBEV	0.001035	0.004761	0.015734	0.006418	0.001035	0.001242	0.002070	0.003312	0.030846	0.004761	0.035607
	White milk, all sizes	BEV	0.000000	0.000000	0.002137	0.000000	0.000000	0.002137	0.000000	0.000000	0.004273	0.000000	0.004273
	Wine cask bladders	BEV	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000	0.000000
	Wipes	NBEV	0.000000	0.000122	0.000041	0.000081	0.000003	0.000030	0.000000	0.000027	0.000274	0.000030	0.000304
	TOTAL		0.005303	0.012929	0.151622	0.022422	0.002916	0.014536	0.006150	0.010505	0.192691	0.033692	0.226383
GRAND T	OTAL		0.013889	0.071277	0.414142	0.219229	0.045926	0.135044	0.010278	0.023201	0.775319	0.157669	0.932987