



## LAUNCH OF 5TH EDITION OF THE GUIDE TO BETTER PUBLIC TOILET DESIGN & MAINTENANCE

Singapore, 18 November 2022 – At the 14th LOO (Let's Observe Ourselves) Awards, one of a series of satellite events supporting Clean and Green Singapore this year, Guest-of-Honour Mr Baey Yam Keng, Senior Parliamentary Secretary for Sustainability and the Environment, launched the 5th edition of the Guide to Better Public Toilet Design and Maintenance (**Annex A**) together with Mr Ho Chee Kit, Honorary President of the Restroom Association (Singapore) or RAS.

Mr. Ho Chee Kit, President of the RAS, said, "With the prevalence of COVID-19 and emphasis on safer public restrooms, this latest edition includes products which are effective against viruses such as 3 in 1 compatible products that can perform multiple functions of cleaning, disinfecting and deodorising in one step, antimicrobial coatings, paints and lighting technology. This edition also includes NEA's revised Code of Practice on Environmental Health on public toilet requirements which took effect in March this year. I hope this latest Guide will benefit owners, operators and cleaning service providers to enable them to better create a clean and safe restroom environment for everyone."

During the LOO Awards, the first certifications for smart restroom products under the Singapore Green Building Product (SGBP) certification scheme (**Annex B**) were also presented. A joint certification pathway co-managed by the RAS and the Singapore Green Building Council (SGBC), products with Detect, Feedback, Eliminate & Clean (DFEC) smart features (**Annex C**) are rated against established criteria and complement the RAS' Happy Toilet Programme (**Annex D**). Mr. Baey presented the certificates to Convergent Smart Technologies Pte Ltd (Sensor System), Dyson Singapore Pte Ltd (Smart Hand Dryer) and Infinergy Systems Solutions Pte Ltd (Interactive Feedback System).

Mr. Allen Ang, SGBC Board Technical Lead, said, "As Singapore moves towards its Singapore Green Plan targets, there is a confluence of green and smart technology that can move the needle on sustainability. We are happy to leverage our expertise in certifying green building products to help assess the efficiency of smart restroom products, which will definitely go towards the raising of cleanliness standards for our public toilets."

59 award recipients (**Annex E**) were recognised at the LOO Awards, which is also one of the satellite events of Clean & Green Singapore this year. A new community-sector organisation category was introduced this year with Yuhua Eco Sustainability Group

clinching the award. Apart from presenting the awards to the recipients, Mr Baey also delivered his speech. The LOO Awards is organised every year to commemorate World Toilet Day.

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### **About Restroom Association (Singapore)**

*The vision of the Restroom Association (Singapore) or RAS is A Gracious Society Embracing Excellence in Restroom Culture. Started in 1998 as a non-profit organisation, RAS is dedicated to building an excellent restroom culture by actively engaging owners, the cleaning industry and users to play their part. Some of its programmes or activities – supported by the National Environment Agency (NEA) – initiated and conducted include the Happy Toilet Programme, Happy Toilets @ Preschools Programme, STAR (Sustaining Toilets As Restrooms) Awards Programme, Eco-Assessor Programme and LOO (Let's Observe Ourselves) Carnival & Awards. RAS is a strategic partner in national community events like Clean & Green Singapore and is also a founding member of the World Toilet Organization and the Keep Singapore Beautiful Movement.*

### **About Clean & Green Singapore**

*Clean and Green Singapore aims to inspire Singaporeans to care for and protect our environment by adopting a clean, green and sustainable lifestyle. Each of us can shape our neighbourhoods and common spaces through our green practices, championing a sustainable way of life, and by being a more gracious society. Together, we can make Singapore A Liveable and Endearing Home, and A Vibrant and Sustainable City.*

*A Liveable and Endearing Home – Safeguarding green and blue spaces; embracing smart technology and eco-friendly features in our towns and homes; and enjoying a seamless transportation network in Singapore, which reinforce green living.*

*A Vibrant and Sustainable City – The Government, the community and businesses coming together to develop infrastructure, programmes and jobs that support the move towards a Zero Waste Nation and a leading green economy.*

For more information, visit [www.cgs.gov.sg](http://www.cgs.gov.sg).

### **About World Toilet Day**

*World Toilet Day is observed annually on 19 November. This international day of action aims to raise global awareness of the daily struggle for proper sanitation that a staggering 3.6 billion people face today. In a bid to make sanitation for all a global development priority, the United Nations General Assembly designated 19 November as World Toilet Day on 24 July 2013.*

### ***Glossary of Chinese Terms (In alphabetical order)***

- |                                                          |                     |
|----------------------------------------------------------|---------------------|
| 1. Detect Feedback Eliminate Clean (DFEC) Smart Products | 检测反馈消除清洗 (测馈除洗)智能产品 |
| 2. LOO (Let's Observe Ourselves) Awards                  | 卫浴文化奖               |
| 3. President Ho Chee Kit                                 | 会长何主杰               |
| 4. Board Technical Lead Allen Ang                        | 技术领导洪奕龍             |
| 5. Restroom Association (Singapore)                      | 新加坡卫浴文化协会           |
| 6. Singapore Green Building Council                      | 新加坡绿色建筑委员会          |
| 7. Singapore Green Building Product Certification Scheme | 新加坡绿色建筑产品认证标志       |
| 8. World Toilet Day                                      | 世界厕所日               |

# ANNEX A

## A Guide to Better Public Toilet Design and Maintenance

### Background

This guide provides professionals such as Engineers, Architects, and Environmental & Facility Management professionals with information about good design, maintenance and user education. The 1st edition was published in 1999 by the then Ministry of the Environment. The Restroom Association (Singapore) or RAS, in collaboration with the National Environment Agency (NEA), published the 2nd edition in 2002. The 3rd edition was published in 2013 and launched by then Second Minister for the Environment and Water Resources Ms Grace Fu. The 4th edition was published in 2018 and launched by Dr Amy Khor, then Senior Minister of State for the Environment and Water Resources.

### Key Changes

The latest edition contains the following key changes:

- Certification of restroom products under the Singapore Green Building Product Certification Scheme (**Annex C**); and
- Products capable of eliminating viruses such as COVID-19.

The latest edition also includes NEA's revised Code of Practice on Environmental Health on public toilet requirements which took effect in March this year as follows:

- For toilets unable to incorporate labyrinth entrances but with sufficient space, installation of hands-free or sensor-operated doors is recommended to minimise hand contact for hygiene reasons.
- Design symmetrical layout concept for toilet, where space is available, so as to reduce disruption to toilet usage during cleaning maintenance.
- It is recommended to install bidet fixtures (in at least 1 cubicle in the toilet block) as opposed to water tap points with spring loaded nozzle to minimise wetting of toilet floors.
- Bins shall always be covered and operated without hand contact e.g. foot pedal or electronic motion sensor devices.
- All wash hand basin taps shall be sensor taps with self-closing delayed-action. To ensure that one tap remains functional during power supply outage, one tap per toilet block shall be a battery-operated or chargeable battery-operated sensor type tap. Self-closing delayed-action mechanical type tap shall be installed for toilet block with only one wash hand basin.
- Individually wall-hung full length urinal units shall be installed to facilitate use for different users and to reduce urine drip onto floors.
- Provision of paper towel dispensers are recommended in toilets frequented by immuno-deficient persons and where infection control is critical.

## ANNEX B

### **Detect Feedback Eliminate Clean (DFEC) Smart Restroom Solutions**

The DFEC Smart Restroom Solutions offer the holistic approach on effective maintenance as follows:

- DETECT

The use of sensors, which act as an autonomous system, can effectively detect, monitor and feedback any defects or situations such as ammonia, people traffic, lighting levels, abnormal water usage, hand soap, hand towels, toilet paper and litter bins. Some can be rectified through automation while others will alert on demand cleaning needs through notifications. When toilets are not in satisfactory conditions and cannot be rectified through mechanical automation, notification alerts are instantly sent to the owners, operators, facility management crew and cleaning supervisors so that the cleaning crew can be deployed on site to rectify them in the quickest possible time. The use of sensors can also effectively gather data for useful analytics such as the determination of peak and off-peak usage and forecast cleaning regimes to optimise cleaning crew deployment. The use of sensors not only translates to improved cleaning and maintenance efficiency but also better user satisfaction and lesser reliance on manpower.

- FEEDBACK

Defects and any situations, which cannot be effectively monitored by smart sensors, can be complemented with the installation of an interactive feedback system. Installation of an interactive feedback system effectively complements the smart sensors in the event if the sensors are defective or under servicing and maintenance. On the other hand, the installation of sensors also complements the feedback system to monitor the validity of public feedback. An interactive feedback system can provide a simple and intuitive channel for public users to feedback the state of the toilet. Any negative feedback will instantly alert the maintenance management and cleaning crew for any specific follow-up actions in the quickest possible time, thus ensuring the best user experience. The information collected on the real time monitoring of the performance levels of the cleaning crew can effectively serve as justification for rewards or improvements. In addition, the feedback system is an extensive data gathering platform that also provides relevant preventive and predictive analytics for owners, operators and cleaning companies. The data collected can be used for resource planning and allocation, equipment reliability, cleaning crew's attendance and performance evaluation, visitors trending and others.

- ELIMINATE

Ammonia, odour, bacteria and viruses can be better eliminated during toilet cleaning with the use of green sanitisers and deodourisers such as ozonated water. The application of infused anti-stain material or self-cleaning protective coatings on tiles, basins, urinals and WCs can provide a layer of coating to prevent moisture, dirt, grime and oil. Surfaces protected by this coating facilitate cleaning efforts and eliminate the problem of tough stains and graffiti. Some coatings also have an antibacterial feature and they can eliminate bacteria which comes into contact with the coated tiles.

- CLEAN

The adoption of technology such as machinery to facilitate toilet cleaning and also the adoption of advanced facilities for self-cleaning by users such as the use of bidets, self-powered taps, fast-drying hand dryers, taps integrated with fast and hygienic hand-drying function for effective hand washing. The use of self-powered taps eliminates the need to provide electrical points to power the sensors in the taps. The tap sensors are powered internally. Running water will create power which is stored in a battery built into the tap. Power from the battery will be used for sensing purposes for next use. The use of fast-drying and hygienic hand dryers can eliminate operational complexity to store, replenish and dispose used towels. Fast-drying hand dryers do not need any heating element which is energy saving and eco-friendly as compared to conventional warm air dryers which are high in energy consumption. Fast-drying hand dryers can be equipped with HEPA filters which trap bacteria and viruses but they require replacement periodically. This translates to cleaner air blown onto the hands. There are hand dryers that allow drying of hands at the wash basin without the need to move to a separate drying area, thus reducing wet floors.

## ANNEX C

### **Singapore Green Building Product Certification Scheme**

The Singapore Green Building Product (SGBP) scheme is a certification for green building products and materials. It is based on scientific and engineering principles and built upon the collective knowledge and expertise of the building and construction industry. The SGBP certification scheme advances the built environment to one that is greener and more carbon-efficient while facilitating sustainable procurement. The certification ensures that sustainability is integrated throughout the design and manufacturing process of green building products.

Aligned with the World Green Building Council's vision of green buildings for everyone, everywhere, SGBC aims to make the spaces we live, work and play in healthier, more sustainable, and more resource-efficient. SGBC recognises the need for green building products, materials and solutions to support this vision. With the SGBP certification scheme, we've set a high benchmark for sustainable building products and materials. This ensures sustainability targets are met while providing transparency and credibility to the products we choose to use when building green into our spaces and places.

The SGBP covers a wide range of building products across the following categories and assesses them based on their sustainability performance:

- Architectural
- Civil & Structural
- Mechanical
- Electrical
- Landscaping
- Smart

The SGBP Certification Scheme looks at the whole lifecycle of products to account for the full impact. Assessment criteria is categorised into common criteria which apply to most products and specific criteria which apply only to relevant products. For some products, the assessment against criteria covers the whole product lifecycle, while for other products, the assessment criteria focuses on a select few lifecycle stages across raw material extraction or cultivation, manufacturing, distribution, use, and end-of-use. This grounded methodology enables building products to be impartially evaluated for their relevant, noteworthy qualities, benchmarked against similar products in its category.

After the assessment, the certified product will be awarded a rating between 1 and 4 ticks, based on its performance. 1 tick indicates good performance, while 4 ticks indicates leading industry performance.

The SGBP is one of the key standards and benchmarks for green building products in the building and construction industry. Products and materials certified by the SGBP are highly recognised under the Green Mark Scheme, Singapore's national green building rating tool administered by the Building and Construction Authority (BCA), which allows certified products to accrue points that count towards a project's Green Mark rating. The more highly rated a product is under the SGBP Scheme (i.e., the more ticks it has achieved), the more points are awarded towards the Green Mark rating.

The SGBP is also widely accepted by regional green building rating tools for its coverage of product's sustainability performance. Examples include GreenRE, a rating tool set up by the Real Estate & Housing Developments' Association (REHDA) of Malaysia, and LOTUS, Vietnam Green Building Council's rating tool. The SGBP complies with many of the

requirements in ISO 14024 Environmental labels and declarations — Type I environmental labelling.

The SGBP is similar to internationally leading eco-labels, such as Cradle2Cradle, DECLARE, Global Green Tag, Good Environmental Choice Australia, Korea Environmental Industry and Technology Institute. Future versions of the SGBP may provide additional recognition for products that excel in addressing social issues, circular economy, and low embodied carbon, and reorganise the Scheme's governance to allow for products certified under our Scheme to be recognised under other eco-labels.



## ANNEX D

### Happy Toilet Programme

Latest Number of Happy Toilets				
3-Stars	4-Stars	5-Stars	6-Stars	TOTAL
256	625	381	42	1304

The Happy Toilet Programme (HTP) was launched by Mr Lim Swee Say, the former Minister for the Environment on 1 July 2003. The HTP was developed and implemented by RAS with the strong support from the National Environment Agency (NEA).

The HTP is a star-grading initiative for public toilets which focuses on five main areas - Design, Cleanliness, Maintenance, Effectiveness and Satisfaction. Users will also leave the toilet happy, as the programme will ensure that they have the best experience, with all their needs met.

The cornerstone of the HTP is a grading system, based on minimum and progressive standards that start at 3 stars, to 4 stars, 5 stars and a maximum of 6 stars. The 6-star rating is the latest highest accreditation introduced with effect from 1 January 2015.

Application is open to all owners of public toilets in Singapore, anytime throughout the year. Once graded, the certification of quality has 12 months' validity. "Happy Toilets" will be promoted through the RAS website so that the public can identify star graded facilities.

3 stars (at least 60 out of 108 points) = Clean Restroom

- Facilities in working condition
- Provision of basic amenities i.e. hand soap, toilet paper, etc
- No odour, litter-free
- Reasonably dry floor and facilities
- Customer Satisfaction

4 stars (at least 86 out of 108 points) = Good Restroom

- Meet all the above-mentioned 3 stars' requirements
- Special delights and user-friendly facilities
- Adoption of at least one of the DFEC (Detect, Feedback, Eliminate & Clean) smart solutions

5 stars (at least 96 out of 108 points) = Premium Restroom

- Meet all the above-mentioned 4 stars' requirements
- Eco-friendly facilities
- Adoption of at least two of the DFEC smart solutions

6 stars (at least 104 out of 108 points) = Magnificent Restroom

- Meet all the above-mentioned 5 stars' requirements
- Adoption of all four of the DFEC smart solutions to increase productivity and efficiency
- All cleaning attendants completed the Singapore Workforce Skills Qualifications (WSQ) module in washroom cleaning.

For more details, please visit <http://www.toilet.org.sg/happytoilets>

## ANNEX E

### LOO (Let's Observe Ourselves) Awards

#### Scope

All efforts made by an organisation and individual in promoting and enhancing the standard of restroom cleanliness will be taken into account in the selection of recipients for the awards.

#### Eligibility

The LOO Awards is open to all organisations and individuals in Singapore.

#### LOO Awards Categories

There are three (3) LOO Awards categories open for nominations: Organisation, Cleaning Industry and Individual.

- Organisations are awarded in the following categories:
  1. Private Sector/Public Sector/Community Sector
- Cleaning Industry is awarded in the following categories:
  1. Cleaning Service Provider
  2. Restroom Cleaning Attendant
- Individuals are awarded in the following categories:
  1. Adult individual
  2. LOO Kidz (primary)

The following categories are not open for nominations.

- Best Happy Toilets are awarded in the following categories:
  1. Market and Food Centre
  2. Office
  3. Public Transport
  4. Shopping Centre
  5. Happy Toilet of the Year

## **ORGANISATION (IN APLPHABETICAL ORDER)**

S/N	Recipient	Type	Description of Achievements
1	Marina Bay Sands Pte Ltd	Private Sector	<ul style="list-style-type: none"> <li>All 36 toilets at The Shoppes at Marina Bay Sands certified as 6-star Happy Toilets</li> <li>Adoption of holistic smart solutions on toilet maintenance including litterbin sensor and trials on toilet paper sensor</li> </ul>
2	Maritime & Port Authority of Singapore	Public Sector	<ul style="list-style-type: none"> <li>All its offices certified as Happy Toilets with mTower certified as 6 stars with adoption of holistic smart solutions</li> <li>Marina South Pier, the first pier certified as 5 stars</li> </ul>
3	Yuhua Eco Sustainability Group	Community Sector	<ul style="list-style-type: none"> <li>Participated in the Neighbourhood Toilets Community Group initiative launched by Public Hygiene Council (PHC) from May to July 2022</li> <li>Educated residents &amp; patrons of PDSS Coffeeshop at Block 318B Jurong East</li> <li>Decorated toilets and developed toilet collaterals to raise awareness, checked toilets daily &amp; provided feedback to coffeeshop</li> </ul>

## **CLEANING INDUSTRY**

S/N	Recipient	Type	Description of Achievements
4	Hong Ye Group Pte Ltd	Cleaning Service Provider	<ul style="list-style-type: none"> <li>62 toilets at 5 shopping centres accredited 4 or 5-star Happy Toilets</li> <li>48 cleaning attendants trained in washroom cleaning with 5 of its restroom attendants awarded this year</li> <li>Awarded SG Techblazer Awards 2020 for adoption of technology in toilets and other common areas</li> <li>Accredited National Environment Agency's Clean Mark Silver Award</li> </ul>

5	Ms Annie Peng <A-Force Maintenance Pte Ltd>	Restroom Cleaning Attendant	<ul style="list-style-type: none"> <li>• Close to 3 years of cleaning experience</li> <li>• Maintained 4-star Happy Toilets at Downtown Line MRT stations</li> <li>• Completed 3 WSQ courses in environmental cleaning</li> </ul>
6	Mr Lee Hung Ming <A-Force Maintenance Pte Ltd>		<ul style="list-style-type: none"> <li>• 1 year of cleaning experience</li> <li>• Maintained 4-star Happy Toilets at Central zone MRT stations</li> <li>• Completed 2 WSQ courses in environmental cleaning</li> </ul>
7	Mdm Lim Ah Lan <A-Force Maintenance Pte Ltd>		<ul style="list-style-type: none"> <li>• 15 years of cleaning experience</li> <li>• Maintained 4-star Happy Toilets at East zone MRT stations</li> <li>• Completed 2 WSQ courses in environmental cleaning including washroom cleaning</li> </ul>
8	Ms Wong Fah Lan <Agape Little Uni @ Gambas>		<ul style="list-style-type: none"> <li>• 3 years of cleaning experience</li> <li>• Completed 1 WSQ course in environmental cleaning and training conducted by the Restroom Association (Singapore)</li> <li>• Preschool accredited with Early Childhood Development Agency's Singapore Preschool Accreditation Framework and Platinum Award for achieving three thumbs-up accreditation under the Happy Toilets @ Preschools programme</li> </ul>
9	Ms Cai Ai Yu <Anergy Building Services Pte Ltd>		<ul style="list-style-type: none"> <li>• 15 years of cleaning experience</li> <li>• Maintained toilets at Winsland House office</li> <li>• Completed 2 WSQ courses in environmental cleaning</li> </ul>
10	Mdm Khalifah Binte Abd Aziz <Anergy Building Services Pte Ltd>		<ul style="list-style-type: none"> <li>• 15 years of cleaning experience</li> <li>• Maintained toilets at Dahila Park Condo</li> <li>• Completed 7 WSQ courses in environmental cleaning including washroom cleaning</li> </ul>

11	Mdm Zuraidah Binte Hassan <Anergy Building Services Pte Ltd>	Restroom Cleaning Attendant	<ul style="list-style-type: none"> <li>• 9 years of cleaning experience</li> <li>• Maintained toilets at Enterprise Centre</li> <li>• Completed 7 WSQ courses in environmental cleaning including washroom cleaning</li> </ul>
12	Mr Fu Yong Qi <Hong Ye Group Pte Ltd>		<ul style="list-style-type: none"> <li>• 5 years of cleaning experience</li> <li>• Maintained 5-star Happy Toilets at Century Square shopping centre</li> <li>• Completed 1 WSQ course in environmental cleaning</li> </ul>
13	Mrs Jeniffer Rebella Cubinar <Hong Ye Group Pte Ltd>		<ul style="list-style-type: none"> <li>• 7 years of cleaning experience</li> <li>• Maintained 5-star Happy Toilets at Tiong Bahru Plaza shopping centre</li> <li>• Completed 1 WSQ course in environmental cleaning</li> </ul>
14	Mr Rohitashv Kumar <Hong Ye Group Pte Ltd>		<ul style="list-style-type: none"> <li>• 11 years of cleaning experience</li> <li>• Maintained 4-star Happy Toilets at Tampines One shopping centre</li> <li>• Completed 1 WSQ course in environmental cleaning</li> </ul>
15	Ms Tan Hwee Goh <Hong Ye Group Pte Ltd>		<ul style="list-style-type: none"> <li>• 5 years of cleaning experience</li> <li>• Maintained 4-star Happy Toilets at Hougang Mall shopping centre</li> <li>• Completed 1 WSQ course in environmental cleaning</li> </ul>
16	Mr Zhou Shao Jian <Hong Ye Group Pte Ltd>		<ul style="list-style-type: none"> <li>• 10 years of cleaning experience</li> <li>• Maintained toilets at Sengkang Hospital</li> <li>• Completed 1 WSQ course in environmental cleaning</li> </ul>
17	Mdm Tan Geok Eng <LS 2 Services Pte Ltd>		<ul style="list-style-type: none"> <li>• 11 years of cleaning experience</li> <li>• Maintained toilets at Dazhong Primary School which was awarded Platinum STAR award under the STAR (Sustaining Toilets As Restrooms) Awards Programme</li> </ul>

		Restroom Cleaning Attendant	<ul style="list-style-type: none"> <li>Completed 7 WSQ courses in environmental cleaning including washroom cleaning</li> </ul>
18	Mdm Tan Kim Choo <LS 2 Services Pte Ltd>		<ul style="list-style-type: none"> <li>11 years of cleaning experience</li> <li>Maintained toilets at Dazhong Primary School which was awarded Platinum STAR award under the STAR (Sustaining Toilets As Restrooms) Awards Programme</li> <li>Completed 2 WSQ courses in environmental cleaning including washroom cleaning</li> </ul>
19	Mdm Chew Mei Lan <PCF Sparkletots Preschool @ Nanyang Blk 934>		<ul style="list-style-type: none"> <li>9 years of cleaning experience</li> <li>Completed training conducted by the Restroom Association (Singapore)</li> <li>Preschool accredited with Early Childhood Development Agency's Singapore Preschool Accreditation Framework and three thumbs-up accreditation under the Happy Toilets @ Preschools programme</li> </ul>
20	Mdm An Xiang <PCF Sparkletots Preschool @ Telok Blangah Blk 44>		<ul style="list-style-type: none"> <li>3 years of cleaning experience</li> <li>Completed training conducted by the Restroom Association (Singapore)</li> <li>Preschool accredited with Early Childhood Development Agency's Singapore Preschool Accreditation Framework and Platinum Award for achieving three thumbs-up accreditation under the Happy Toilets @ Preschools programme</li> </ul>
21	Mdm Lim Siew Eng <PCF Sparkletots Preschool @ Yew Tee Blk 690D>		<ul style="list-style-type: none"> <li>18 years of cleaning experience</li> <li>Completed 1 WSQ course in environmental cleaning and training conducted by the Restroom Association (Singapore)</li> <li>Preschool accredited with Early Childhood Development Agency's Singapore Preschool Accreditation Framework and three thumbs-up accreditation under the Happy Toilets @ Preschools programme</li> </ul>
22	Mdm Choong Wai Yin <Primech A&P Pte Ltd>		<ul style="list-style-type: none"> <li>More than 30 years of cleaning experience</li> </ul>

		Restroom Cleaning Attendant	<ul style="list-style-type: none"> <li>Maintained toilets at Nanyang Polytechnic</li> <li>Completed 4 WSQ and NSRS courses in environmental cleaning including washroom cleaning</li> </ul>
23	Mdm Eng Ah Lang <Primech A&P Pte Ltd>		<ul style="list-style-type: none"> <li>14 years of cleaning experience</li> <li>Maintained toilets at Nanyang Polytechnic</li> <li>Completed 2 WSQ courses in environmental cleaning</li> </ul>
24	Mr Mohd Shahrin Bin Salatoon <Right Service Pte Ltd>		<ul style="list-style-type: none"> <li>12 years of cleaning experience</li> <li>Maintained 6-star Happy Toilets at mTower's Maritime &amp; Port Authority of Singapore</li> <li>Completed 3 WSQ courses in environmental cleaning and training conducted by Restroom Association (Singapore)</li> </ul>
25	Mdm Juliana Binte Mohd Keten <Seng Foo Building Construction Pte Ltd>		<ul style="list-style-type: none"> <li>6 years of cleaning experience</li> <li>Maintained toilets at Assumption English School which was awarded Silver STAR award under the STAR (Sustaining Toilets As Restrooms) Awards Programme</li> <li>Completed 4 WSQ courses in environmental cleaning</li> </ul>
26	Mr Aw Kok Choy <Re Sustainability Cleantech Pte Ltd>		<ul style="list-style-type: none"> <li>24 years of cleaning experience</li> <li>Maintained toilets at SGX Centre</li> <li>Completed 3 WSQ and NSRS courses in environmental cleaning including washroom cleaning</li> </ul>
27	Mdm Azizah Binte Mohamed Hamsa <Re Sustainability Cleantech Pte Ltd>		<ul style="list-style-type: none"> <li>6 years of cleaning experience</li> <li>Maintained toilets at Changi Airport</li> <li>Completed 6 WSQ and NSRS courses in environmental cleaning including washroom cleaning</li> </ul>
28	Mdm Chan Ah Kiam <Re Sustainability Cleantech Pte Ltd>		<ul style="list-style-type: none"> <li>6 years of cleaning experience</li> <li>Maintained toilets at Changi Airport</li> </ul>

		Restroom Cleaning Attendant	<ul style="list-style-type: none"> <li>Completed 6 WSQ and NSRS courses in environmental cleaning including washroom cleaning</li> </ul>
29	Mr Chin Lian Khin <Re Sustainability Cleantech Pte Ltd>		<ul style="list-style-type: none"> <li>10 years of cleaning experience</li> <li>Maintained toilets at 30 Hill Street office building</li> <li>Completed 4 WSQ courses in environmental cleaning including washroom cleaning</li> </ul>
30	Mr Mohamed Tahir Bin Abdul Jalil <Re Sustainability Cleantech Pte Ltd>		<ul style="list-style-type: none"> <li>9 years of cleaning experience</li> <li>Maintained toilets at SGX Centre</li> <li>Completed 3 WSQ courses in environmental cleaning including washroom cleaning</li> </ul>
31	Mr Ong Soon Nah <Re Sustainability Cleantech Pte Ltd>		<ul style="list-style-type: none"> <li>6 years of cleaning experience</li> <li>Maintained toilets at Changi Airport</li> <li>Completed 6 WSQ and NSRS courses in environmental cleaning including washroom cleaning</li> </ul>
32	Ms Sarojini A/P Subramaniam <Re Sustainability Cleantech Pte Ltd>		<ul style="list-style-type: none"> <li>9 years of cleaning experience</li> <li>Maintained toilets at Changi Airport</li> <li>Completed 3 WSQ courses in environmental cleaning including washroom cleaning</li> </ul>
33	Mdm Tan Siok Hoon <Re Sustainability Cleantech Pte Ltd>		<ul style="list-style-type: none"> <li>7 years of cleaning experience</li> <li>Maintained toilets at Stamford American International School</li> <li>Completed 3 WSQ courses in environmental cleaning including washroom cleaning</li> </ul>
34	Mdm Toh Chew Peng <Re Sustainability Cleantech Pte Ltd>		<ul style="list-style-type: none"> <li>7 years of cleaning experience</li> <li>Maintained toilets at Singapore American School</li> <li>Completed 4 WSQ courses in environmental cleaning including washroom cleaning</li> </ul>



## INDIVIDUAL

S/N	Recipient	Type	Occupation / Designation	Description of Achievements
35	Mr Josiah Tan Kai Rong	LOO Kidz	Student, Chongfu School	<ul style="list-style-type: none"> <li>• Student leader who led the decoration of restrooms with educational themes</li> <li>• Conceptualized and presented his ideas to encourage other prefects to participate actively</li> <li>• Created educational posters and decals for display in restrooms and led other prefects to execute activities during an exhibition to create awareness on restroom cleanliness</li> </ul>
36	Ms Erela Chia Lixuan		Student, Westwood Primary School	<ul style="list-style-type: none"> <li>• Took initiative to write to teacher to design and replace existing posters which were less effective.</li> <li>• Erela drew and painted the posters for school toilet display to encourage and remind pupils to use the restrooms properly</li> </ul>
37	Ms Joanne Lim Yu-Xi		<ul style="list-style-type: none"> <li>• Joanne made a short video clip on good restroom etiquette to encourage pupils to keep the restrooms clean</li> </ul>	
38	Ms Clarice Chan Yeok Cheng	Adult	Teacher, Cherie Hearts @ Charlton	<ul style="list-style-type: none"> <li>• Educated preschoolers to show kindness to cleaning attendants</li> <li>• Guided preschoolers to create 'thank you' card and paper flowers bouquet presented to cleaning attendant</li> </ul>
39	Mdm Anizah Bte Ahmad		Teacher, PCF Sparkletots Preschool @ Choa Chu Kang Blk10	<ul style="list-style-type: none"> <li>• Led teachers to guide preschoolers to decorate the restrooms with water droplet theme to educate everyone on the preciousness of water</li> <li>• Worked with children to craft rules of maintaining restroom cleanliness</li> </ul>

## **BEST HAPPY TOILET**

The following toilets under the Happy Toilet Programme (HTP) are awarded for achieving the highest scores in terms of cleanliness, maintenance, effectiveness, user satisfaction, design and bonus features.

S/N	Recipient	Type	Star Rating	Score	Remarks
40	Market Street Hawker Centre	Market & Food Centre	5-Star	98 / 108	Selected among 52 HTP market & food centres
41	mTower Level 17, Maritime and Port Authority of Singapore	Office	6-Star	104 / 108	Selected among 87 HTP office toilets at 10 office buildings
42	Choa Chu Kang Bus Interchange	Public Transport	5-Star	98 / 108	Selected among 177 HTP public transport hubs & stations
43	The Shoppes at Marina Bay Sands, Zone 5 Level B2	Shopping Centre	6-Star	106 / 108	Selected among 346 Happy Toilets at 42 Shopping Centres
44	The Shoppes at Marina Bay Sands, Zone 5 Level B2	Happy Toilet of the Year	6-Star	106 / 108	Selected among 1416 Happy Toilets islandwide

## **PLATINUM HAPPY TOILET PRESCHOOLS (IN ALPHABETICAL ORDER)**

S/N	Recipient	Remarks
45	Agape Little Uni @ Clementi	<p>Preschools awarded the highest Three Thumbs-up accreditation for <b>three consecutive years</b> under the Happy Toilets @ Preschool Programme for completing all of the following three phases:</p> <ol style="list-style-type: none"> <li>1. Design phase - All toilets meeting the minimum standard equivalent to the 3-star rating of the commercial Happy Toilet Programme.</li> <li>2. Maintenance phase - On-site training for caretakers and housekeepers on dos and don'ts of preschool and restroom cleaning</li> <li>3. Education phase - Hygiene talks/activities for preschoolers and hygiene workshops for teachers or hygiene talks for parents/guardians</li> </ol>
46	Agape Little Uni @ Gambas	
47	Nobleland Arts N Learning Place @ Waterway	
48	PCF Sparkletots Preschool @ Limbang Blk 567	
49	PCF Sparkletots Preschool @ Pasir Ris Drive 6 Blk 412	
50	Pu Ti Child Care Centre	
51	YWCA Bukit Gombak Child Development Centre	

## **PLATINUM STAR SCHOOLS (IN ALPHABETICAL ORDER)**

S/N	Recipient	Remarks
52	APSN Katong School	Schools are awarded the highest Gold STAR accreditation under the STAR (Sustaining Toilets As Restrooms) Awards Programme when they complete all three phases.
53	Bendemeer Primary School	Schools with Gold STAR accreditation for <b><u>three consecutive years</u></b> are awarded the Platinum STAR.
54	Bedok Green Primary School	The three phases are as follows:
55	Bukit View Primary School	1. Education & Awareness - Assembly talks for students and workshops for students assigned to take up any of the following projects:
56	Fern Green Primary School	- Decorating / enhancing the washrooms - Cleaning attendants' appreciation activities - Creating educational/awareness material for an exhibition
57	Northland Primary School	- Conducting surveys or case studies - Creating videos or web content - Inspecting their own washrooms and providing feedback - Holding assembly talks in school or at other establishments
58	Qihua Primary School	2. Maintenance & Service - Checking the qualifications and cleaning routines of all cleaning attendants to ensure they are trained and to conduct training for those who are not.
59	Teck Whye Primary School	3. Design & Standards - All toilets meeting the minimum standard equivalent to the 3-star rating of the commercial Happy Toilet Programme.