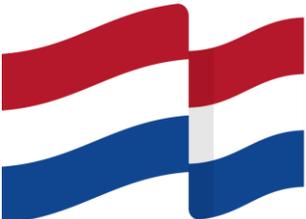
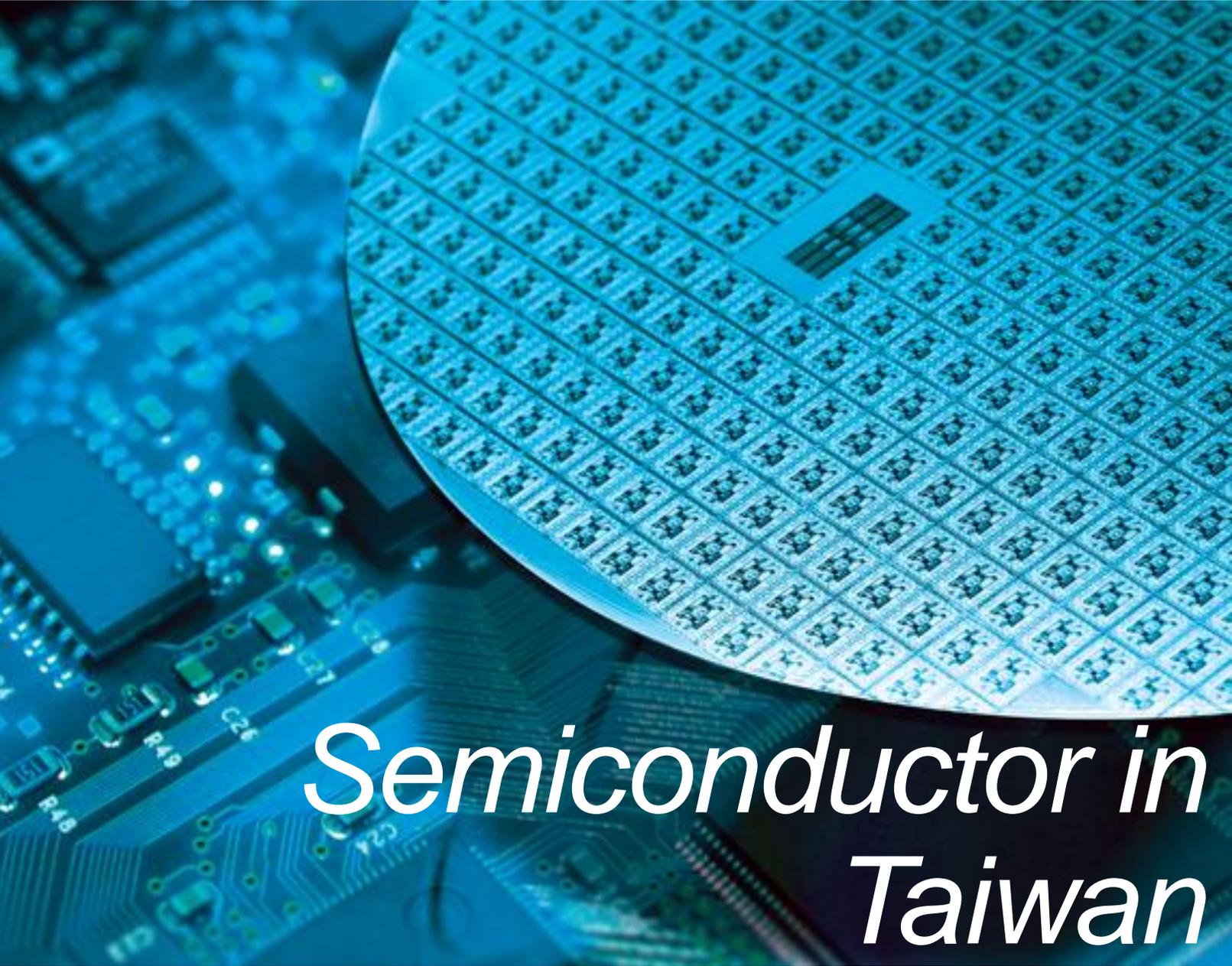


Netherlands



**Netherlands**  
Office Taipei  
荷蘭在台辦事處



*Semiconductor in  
Taiwan*

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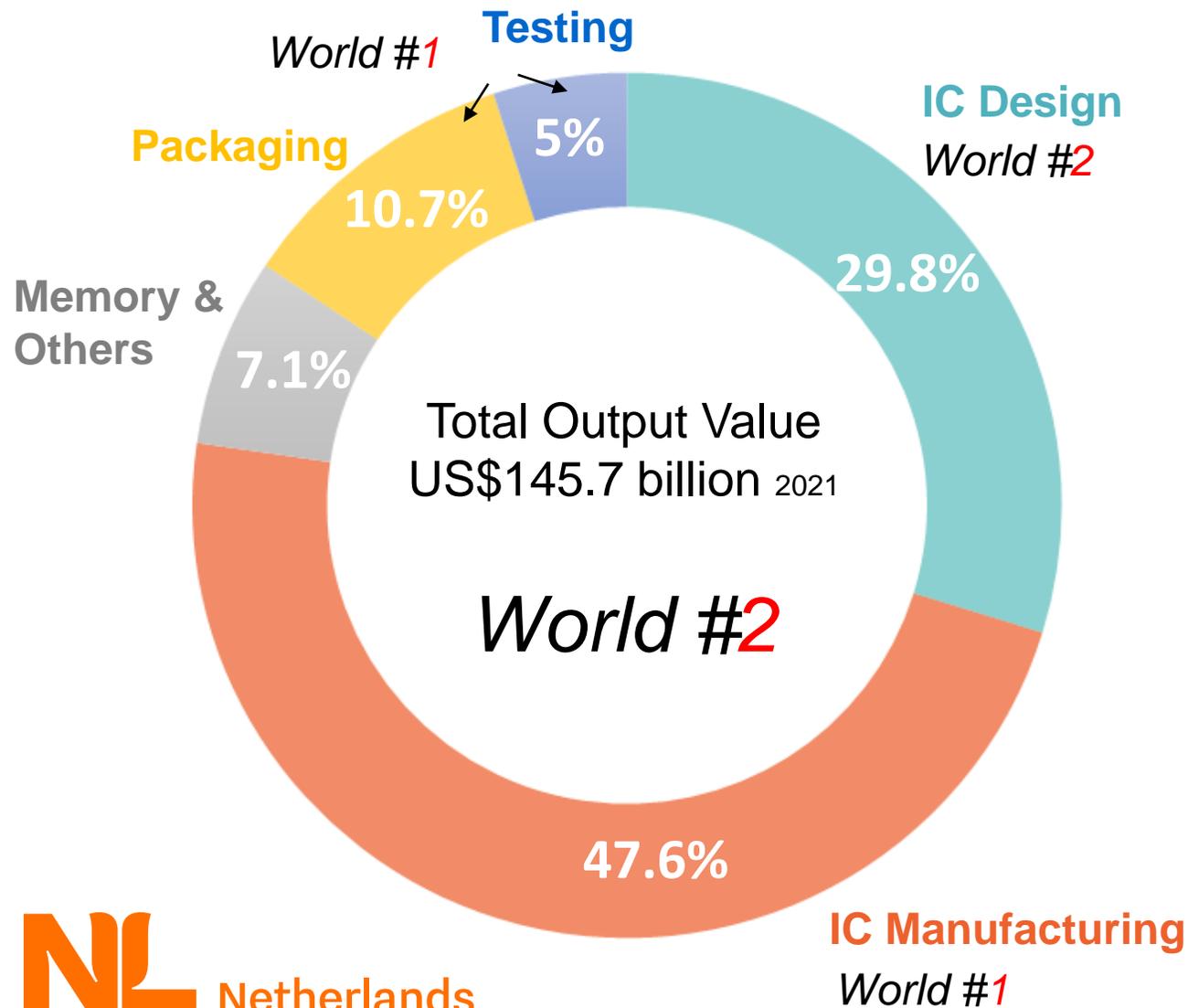
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# World's 2<sup>nd</sup> largest player in IC industry



## Excellences of Taiwan Semiconductor Industry

Global revenue  
**2<sup>nd</sup>** USD 162 billion in 2022

Foundry  
**No. 1**

Packaging  
**No. 1**

IC Design  
**No. 2**

Memory  
**No. 4**



SOURCE : ISTI, Industrial Technology Research Institute

# 2021 Top 10 Semiconductor Companies in Taiwan

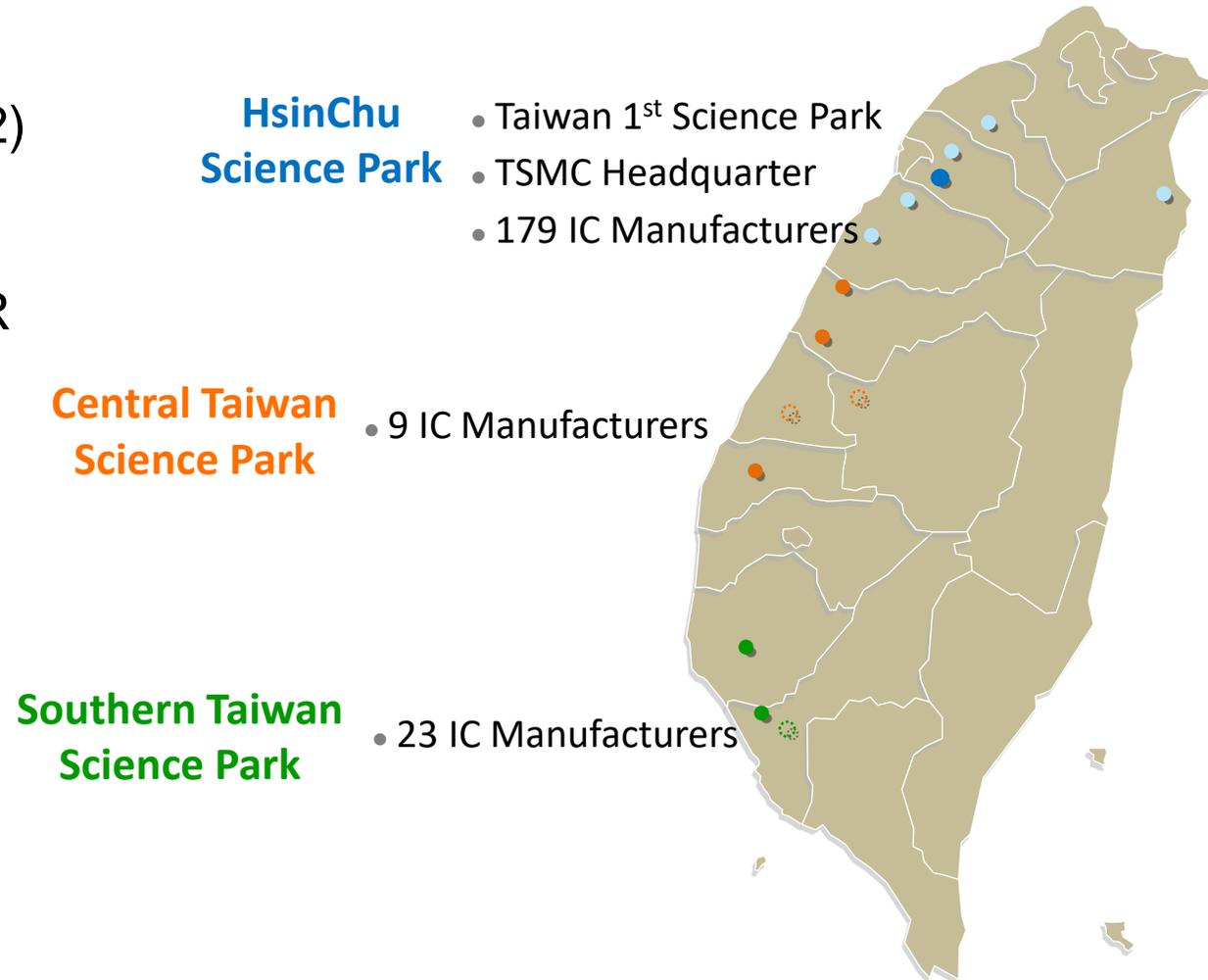
| Ranking | Company                             | Type                   |
|---------|-------------------------------------|------------------------|
| 1       | TSMC                                | Foundry                |
| 2       | MediaTek                            | IC Design              |
| 3       | ASE Group                           | IC Packaging & Testing |
| 4       | United Microelectronics Corporation | Foundry                |
| 5       | Novatek Microelectronics            | IC Design              |
| 6       | Realtek Semiconductor Corp.         | IC Design              |
| 7       | Winbond Electronics Corp.           | Memory Manufacturing   |
| 8       | Nanya Technology                    | Memory Manufacturing   |
| 9       | Powertech Technology Inc.           | IC Packaging & Testing |
| 10      | Powerchip Technology Corp.          | Foundry                |

# *A STRONG and MATURE ECOSYSTEM*

- IC products contribute 34,8% of total exports in 2021.
- **More than 90%** of the advanced chips (process nodes below 10 nanometers) is coming from **Taiwan**.
- By the end of 2020, Taiwan semiconductor industry consisted of **238 IC fabless design houses, 13 fabrication companies, and 37 packaging and testing houses**. It also included substrate suppliers, wafer suppliers, mask makers, and lead frames companies.

# Everything on One Island

- Size is similar to NL (37 vs 41.000km<sup>2</sup>)
- Total 14 science parks (incl in development/ planning)
- 2.5 Hours from North to South by HSR



**HsinChu  
Science Park**

- Taiwan 1<sup>st</sup> Science Park
- TSMC Headquarter
- 179 IC Manufacturers

**Central Taiwan  
Science Park**

- 9 IC Manufacturers

**Southern Taiwan  
Science Park**

- 23 IC Manufacturers

# Comprehensive ICT Ecosystem in Taiwan

## IC

IC Design : MTK, Novatek, Realtek  
 IC Foundry : TSMC, UMC  
 IC Assembly/Test : ASE, SPIL



## PCB

Unimicron, Nan Ya PCB, Tripod, Compaq, Hannstar Board, Chin Poon, Kinsus, Careergroup



## Connector

Hon Hai/ Foxconn, Foxlink, LOTES, P-TWO, Adanced Connectek, Alltop.



## Display

AUO, INNOLUX, CPT, PVI



## Optical component

Optotech, Everlight, TYNTEK, EPISTAR, I-CHIUN PRECISION, Unity Opto, Formosa Epitaxy



## Passive component

Yageo, Walsin, Holy Stone, LELON, Chilisin, TA-I Chilisin, TKS, Ralec,



## Battery

Simplo, Dynapack, Foxlink, Welldone, C-TECH, E-ONE



## Thermal Module

Chaun Choung, Yeh-Chiang, Asia Vital Components, Forcecon, AURAS



## Electronic Materials

Taiflex, Fulltech, Taiwan Glass, Giga Solar, China Steel Chemical, Young Fast



# *Next Generation Semiconductors Report*

*HPC Chip  
Design*

*Semiconductor  
Equipment*

*Advanced  
Packaging*

*Emerging Tech  
- PIC*

# Semiconductor Equipment

## Current Status

- In 2021, the output of Taiwan's semiconductor equipment industry reached US\$4.23 billion with a growth of 28.7% comparing to 2020.
- The domestic semiconductor industry invested US\$23 billion on equipment purchase. In which US\$20 billion of the investment was spent on overseas equipment purchase.

## Future Focus & Trend

- Government's policy aims to make Taiwan an advanced manufacturing process center for semiconductors.
- To localize equipment production operations of foreign companies.
- To localize the advanced packaging equipment.

## Opportunity

- Collaborate for local development (*extend existing collaborations BESI, Trymax, Boschman, Tempress, Nearfield Instruments etc.*)
- Co-develop equipment for next generation semiconductor applications /packaging with customer's demand and markets (*new R&D opportunity for Demcon, ProDrive, TNO, ..*)



# ASML

Office Taipei

荷蘭在台辦事處

- ASML netto omzet uit Taiwan = **21 Miljard** = 38.2%
- ASML announced **huge investment** plans in Taiwan

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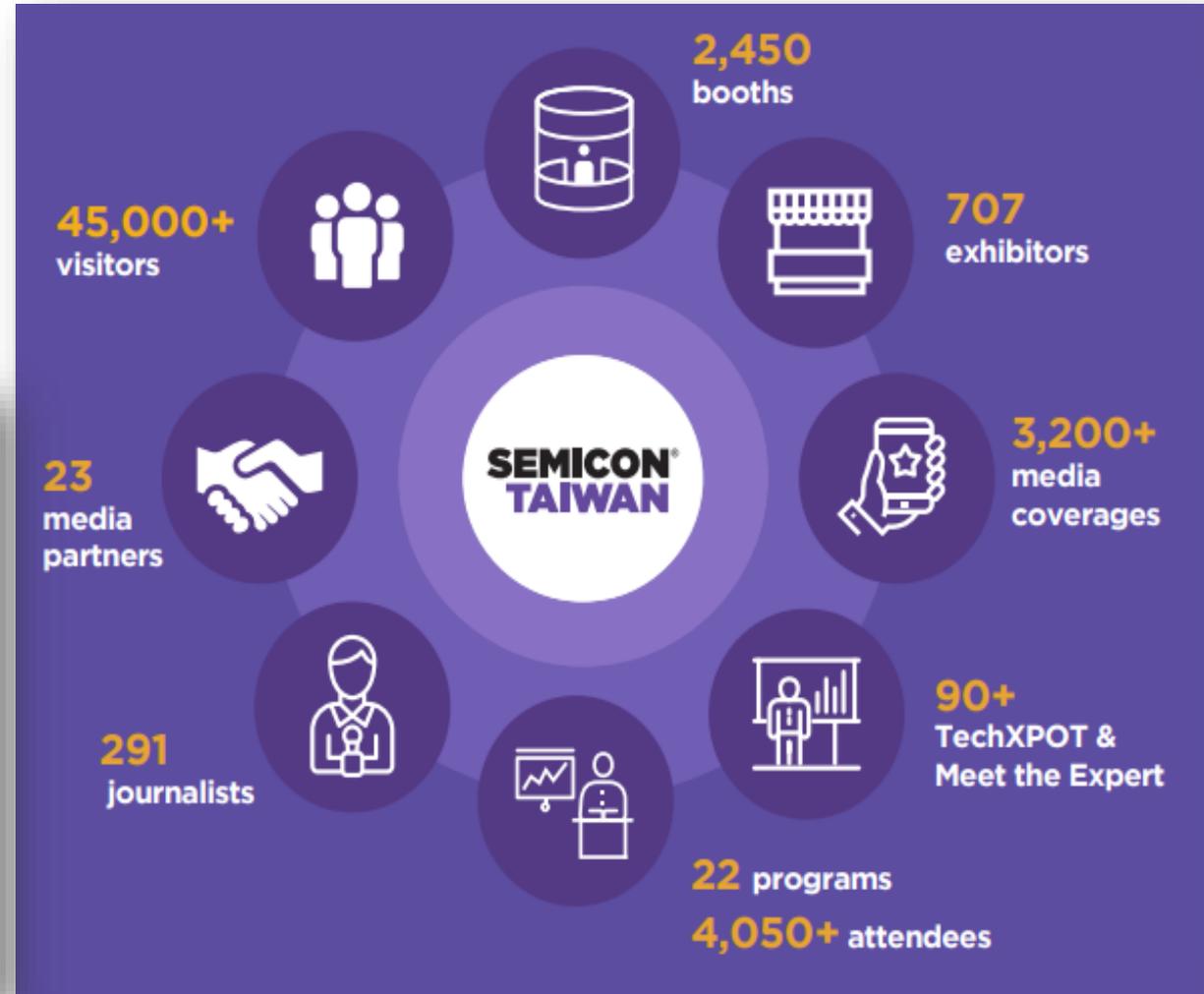
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# The Largest Semiconductor Event in Taiwan

## SEMICON Taiwan 2023

Location: Taipei, Taiwan

Date: 06. – 08. Sep



# The Largest Semiconductor Event in Taiwan

## Optional: Leadership Gala Dinner

Exclusive networking opportunity that connects with 600 VIPs in Taiwan semiconductor industry.

Location: Taipei, Taiwan    Date: 06. Sep

2023 Leadership Gala Dinner 18:00-21:00 | Sept. 6<sup>th</sup>

Organizers:



Co-organizer:



2022 Sponsors:



Connect with Industry Leaders



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# NL High-Tech National Pavilion



## NL pavilion mission

Program elements:

- 3 day SEMICON Taiwan
- Logo/ brochure/ product promotion
- Presentation opportunity
- Networking / matchmaking
- Field trip



# NL Pavilion Mission Program (tentative)

|           | Sunday                           | Monday                         | Tuesday   | Wednesday   | Thursday                                    | Friday  |
|-----------|----------------------------------|--------------------------------|---|---|---|---|
| Date      | Sept 3                           | Sept 4                         | Sept 5  | Sept 6  | Sept 7                                      | Sept 8  |
| Theme     |                                  | Prep Up                        | <u>Round Table /<br/>Field Visit</u>            | <u>SEMICON Taiwan:<br/>Networking Day</u>                         | <u>SEMICON Taiwan:<br/>Matchmaking Day</u>  | <u>SEMICON Taiwan</u>                                 |
| Morning   | Fly-in<br>(AMS-TPE)              | Cultural Program<br><br>or/and | NL Delegation Lunch<br>Roundtable<br><br>or/and | NL Pavilion Promotion &<br>Showcase<br>(e.g. seminar, stage-talk) | 1on1 Matchmaking<br><br>or/and              | Exhibition<br><br>or/and                              |
| Afternoon |                                  | Field Trip Visit               | Field Trip Visit                                | NL Pavilion Networking<br>Reception<br><br>or/and                 | World Cafe<br>Matchmaking at NL<br>Pavilion | Free Time   |
| Evening   | Delegation<br>Briefing<br>Dinner |                                |   | Optional – Gala Diner<br>! 600 EUROS pp.                          | Networking Dinner                           | Debriefing –<br>Tea Party<br><br>Fly-out<br>(TPE-AMS) |

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# Innovation Mission

## Photonics Integrated Circuits, Advanced Packaging & Heterogenous Integration

|           | Sunday          | Monday   | Tuesday  | Wednesday   | Thursday  | Friday                                     |
|-----------|-----------------|--|--|---|---|--|
|           | Sept 3          | Sept 4   | Sept 5   | Sept 6  | Sept 7  | Sept 8                                     |
| Morning   | Arrival         | <u>NL – TW Innovation Cooperation &amp; Matchmaking Conference</u> | Optional – hike Elephant Mountain<br><br><u>NL Delegations Lunch Meeting</u> | <u>SEMICON Taiwan</u><br><br><u>NL Pavilion</u><br>Bring brochures/ promotion material to showcase at NL Pavilion | <u>NL – TW Technical/ Expert Discussions</u> at Industrial Technology Research Institute (ITRI) | Optional – cultural visit<br><br>Free time |
| Afternoon |                 |  | <u>Company visit ASE Group</u>   | <u>Networking Reception</u>   | <u>Company Visit TSMC</u>   | Free time                                  |
| Evening   | <u>Briefing</u> |  | Optional – Night Market  | Optional – Gala Diner ! 600 EUROS pp.   | <u>Networking Dinner</u>  | Departure                                  |

## OTHERS

- NL – TW High Level Semicon Dialogue
- Gala dinner (NL table)
- EUREKA GlobalStars
- Other delegations: UK / Sweden

I would love to continue  
the conversation.

Stay in contact via

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