

號碼(No.): ETF20B00036 日期(Date): 02-Dec-2020 頁數(PAGE): 1 of 7

南亞塑膠工業股份有限公司 / NAN YA PLASTICS CORPORATION 嘉義縣新港鄉中洋村中洋工業區2號 / NO. 2, CHUNGYANG INDUSTRIAL PARK, HSINKANG VILLAGE, CHIAYI COUNTY, **TAIWAN**

以下測試樣品係由申請廠商所提供及確認 (The following sample(s) was/were submitted and identified by/on behalf of the applicant as):

南亞塑膠工業股份有限公司(NAN YA PLASTICS CORPORATION) 送樣廠商(Sample Submitted By)

樣品名稱(Sample Description) 4113M(4210M3)

樣品材質(Sample Material) **PET**

收件日(Sample Receiving Date) 23-Nov-2020

測試期間(Testing Period) 23-Nov-2020 to 02-Dec-2020

測試需求 (Test Requested)

依據客戶指定,參考Commission Regulation (EU) No 10/2011及其修訂條文, European Regulation No. 1935/2004 第3條進行測試。測試項目請參閱測試結果表格。 (As specified by client, the sample(s) was/were tested with reference to Commission Regulation (EU) No. 10/2011 with amendments and hence Article 3 of European Regulation No. 1935/2004. Please refer to the result table for testing item(s).)

測試結果(Test Results) 請見下一頁。(Please refer to next page(s).)







號碼(No.): ETF20B00036

日期(Date): 02-Dec-2020

頁數(PAGE): 2 of 7

南亞塑膠工業股份有限公司 / NAN YA PLASTICS CORPORATION 嘉義縣新港鄉中洋村中洋工業區2號 / NO. 2, CHUNGYANG INDUSTRIAL PARK, HSINKANG VILLAGE, CHIAYI COUNTY, TAIWAN

測試部位敘述(Test Part Description)

No.1 : 白色塑膠 (WHITE PLASTIC)

測試結果(Test Results)

通過(PASS)

202					^{担迦(PASS)}
測試項目 (Test Item(s))	測試方法 (Method)	單位 (Unit)	RL	結果 (Result) No.1	限值 (Limit)
總遷移量 (3% 醋酸, 70℃, 2小時) (第三次 溶出) / Overall Migration (3% acetic acid, 70℃, 2 h) (3rd migration)	參考 EN 1186: 2002. / With reference to EN 1186: 2002.	mg/dm²	3	n.d.	10
總遷移量 (50% 乙醇, 70℃, 2小時) (第三次 溶出) / Overall Migration (50% ethanol, 70℃, 2 h) (3rd migration)		mg/dm²	3	n.d.	10
鄰苯二甲酸二 (2-乙基己基)酯 (Di- (2-ethylhexyl) phthalate) (DEHP) (CAS No.: 117-81-7)	參考 EN 14372: 2004, 以 氣相層析/質 譜儀檢測。 / With reference to EN 14372: 2004, the analysis was performed by GC/MS.	mg/kg	30	n.d.	1000 (■1)
鄰苯二甲酸二丁酯 (Dibutyl phthalate) (DBP) (CAS No.: 84-74-2)		mg/kg	30	n.d.	500 (■ 1)
鄰苯二甲酸丁苯甲酯 (Butyl Benzyl phthalate) (BBP) (CAS No.: 85-68-7)		mg/kg	30	n.d.	1000 (1)
鄰苯二甲酸二異壬酯 (Di-isononyl phthalate) (DINP) (CAS No.: 28553-12- 0; 68515-48-0)		mg/kg	100	n.d.	1000 (1)
鄰苯二甲酸二異癸酯 (Di-isodecyl phthalate) (DIDP) (CAS No.: 26761-40- 0; 68515-49-1)		mg/kg	100	n.d.	1000 (1)



號碼(No.): ETF20B00036

日期(Date): 02-Dec-2020

頁數(PAGE): 3 of 7

南亞塑膠工業股份有限公司 / NAN YA PLASTICS CORPORATION 嘉義縣新港鄉中洋村中洋工業區2號 / NO. 2, CHUNGYANG INDUSTRIAL PARK, HSINKANG VILLAGE, CHIAYI COUNTY, TAIWAN

測試項目 (Test Item(s))	測試方法 (Method)	單位 (Unit)	RL	結果 (Result) No.1	限值 (Limit)
鋇 (Barium) (Ba) (第三次溶出 / 3rd migration)	參考 EN 13130-1: 2004, 以感應耦合 電漿發射光譜儀分析。 (3% 醋酸, 70℃, 2 小時) / With reference to EN 13130-1: 2004, the analysis was performed by ICP-OES. (3% acetic acid, 70℃, 2 h)	mg/kg	0.25	n.d.	1
鈷 (Cobalt) (Co) (第三次溶出 / 3rd migration)		mg/kg	0.01	n.d.	0.05
銅 (Copper) (Cu) (第三次溶出 / 3rd migration)		mg/kg	0.25	n.d.	5
鐵 (Iron) (Fe) (第三次溶出 / 3rd migration)		mg/kg	0.25	n.d.	48
鋰 (Lithium) (Li) (第三次溶出 / 3rd migration)		mg/kg	0.5	n.d.	0.6
錳 (Manganese) (Mn) (第三次溶出 / 3rd migration)		mg/kg	0.25	n.d.	0.6
鋅 (Zinc) (Zn) (第三次溶出 / 3rd migration)		mg/kg	0.5	n.d.	5
鋁 (Aluminum) (Al) (第三次溶出 / 3rd migration)		mg/kg	0.25	n.d.	1
鎳 (Nickel) (Ni) (第三次溶出 / 3rd migration)	參考 EN 13130-1: 2004, 以感應耦合電 漿質譜儀分析。 (3% 醋酸, 70℃, 2 小時) / With reference to EN 13130-1: 2004, the analysis was performed by ICP- MS. (3% acetic acid, 70℃, 2 h)	mg/kg	0.01	n.d.	0.02



號碼(No.): ETF20B00036

日期(Date): 02-Dec-2020

頁數(PAGE): 4 of 7

南亞塑膠工業股份有限公司 / NAN YA PLASTICS CORPORATION 嘉義縣新港鄉中洋村中洋工業區2號 / NO. 2, CHUNGYANG INDUSTRIAL PARK, HSINKANG VILLAGE, CHIAYI COUNTY, TAIWAN

測試項目 (Test Item(s))	測試方法 (Method)	單位 (Unit)	RL	結果 (Result) No.1	限值 (Limit)
鋇 (Barium) (Ba) (第三次溶出 / 3rd migration)	參考 EN 13130-1: 2004, 以感應耦合 電漿發射光譜儀分析。 (50% 乙醇, 70℃, 2 小時) / With reference to EN 13130-1: 2004, the analysis was performed by ICP-OES. (50% ethanol, 70℃, 2 h)	mg/kg	0.25	n.d.	1
鈷 (Cobalt) (Co) (第三次溶出 / 3rd migration)		mg/kg	0.01	n.d.	0.05
銅 (Copper) (Cu) (第三次溶出 / 3rd migration)		mg/kg	0.25	n.d.	5
鐵 (Iron) (Fe) (第三次溶出 / 3rd migration)		mg/kg	0.25	n.d.	48
鋰 (Lithium) (Li) (第三次溶出 / 3rd migration)		mg/kg	0.5	n.d.	0.6
錳 (Manganese) (Mn) (第三次溶出 / 3rd migration)		mg/kg	0.25	n.d.	0.6
鋅 (Zinc) (Zn) (第三次溶出 / 3rd migration)		mg/kg	0.5	n.d.	5
鋁 (Aluminum) (Al) (第三次溶出 / 3rd migration)		mg/kg	0.25	n.d.	1
鎳 (Nickel) (Ni) (第三次溶出 / 3rd migration)	參考 EN 13130-1: 2004, 以感應耦合電 漿質譜儀分析。 (50% 乙醇, 70℃, 2 小 時) / With reference to EN 13130-1: 2004, the analysis was performed by ICP-MS. (50% ethanol, 70℃, 2 h)	mg/kg	0.01	n.d.	0.02
甲醛特定遷移 (第三次溶出) / Specific Migration of Formaldehyde (3rd Migration)	參考 EN 13130-1: 2004, 以分光光度計分析。 (3% 醋酸, 70℃, 2 小時) / With reference to EN 13130-1: 2004. Analysis was performed by UV-Vis. (3% acetic acid, 70℃, 2 h)	mg/kg	0.1	n.d.	15
	參考 EN 13130-1: 2004, 以分光光度計分析。 (50% 乙醇, 70℃, 2 小時) / With reference to EN 13130-1: 2004. Analysis was performed by UV-Vis. (50% ethanol, 70℃, 2 h)	mg/kg	0.1	n.d.	15



號碼(No.): ETF20B00036

日期(Date): 02-Dec-2020

頁數(PAGE): 5 of 7

南亞塑膠工業股份有限公司 / NAN YA PLASTICS CORPORATION 嘉義縣新港鄉中洋村中洋工業區2號 / NO. 2, CHUNGYANG INDUSTRIAL PARK, HSINKANG VILLAGE, CHIAYI COUNTY, TAIWAN

測試項目 (Test Item(s))	測試方法 (Method)	單位 (Unit)	RL	結果 (Result) No.1	限值 (Limit)
雙酚 A特定遷移 / Specific Migration of Bisphenol A	參考 EN 13130-1: 2004, 以液相層析 串聯式質譜儀分析。 (3% 醋酸, 70℃, 2 小時) / With reference to EN 13130-1: 2004, the analysis was performed by LC/MS/MS. (3% acetic acid, 70℃, 2 h)	mg/kg	0.01	n.d.	0.05
	參考 EN 13130-1: 2004, 以液相層析 串聯式質譜儀分析。 (50% 乙醇, 70℃, 2 小時) / With reference to EN 13130-1: 2004, the analysis was performed by LC/MS/MS. (50% ethanol, 70℃, 2 h)	mg/kg	0.01	n.d.	0.05
三聚氰胺特定遷移 (第三次溶出) / Specific Migration of Melamine (3rd Migration)	參考 EN 13130-1: 2004, 以高效能液相層析儀二極體陣列偵測器分析。 (3% 醋酸, 70°C, 2 小時) / With reference to EN 13130-1: 2004, the analysis was performed by HPLC/DAD. (3% acetic acid, 70°C, 2 h)	mg/kg	2	n.d.	2.5
	參考 EN 13130-1: 2004, 以高效能液相層析儀二極體陣列偵測器分析。 (50%乙醇, 70° C, 2 小時) / With reference to EN 13130-1: 2004, the analysis was performed by HPLC/DAD. (50% ethanol, 70° C, 2 h)	mg/kg	2	n.d.	2.5
氯乙烯特定遷移量 / Specific migration of Vinyl Chloride Monomer	參考EN13130-1:2004·以HS-GC-MS分析. (3%乙酸水溶液(W/V), 70℃, 2小時) / With reference to EN13130-1:2004, analysis was performed by HS-GC-MS. (3% Acetic acid (W/V) aqueous solution, 70℃ for 2 h)	mg/kg	0.01	n.d.	n.d.



號碼(No.): ETF20B00036 日期(D

日期(Date): 02-Dec-2020

頁數(PAGE): 6 of 7

南亞塑膠工業股份有限公司 / NAN YA PLASTICS CORPORATION 嘉義縣新港鄉中洋村中洋工業區2號 / NO. 2, CHUNGYANG INDUSTRIAL PARK, HSINKANG VILLAGE, CHIAYI COUNTY, TAIWAN

Remark:

- (■1) 限值是依據Commission Regulation 2011年1月14日 (EU) No 10/2011及其修訂案。 / Limit is according to Commission Regulation (EU) No 10/2011 of 14 January 2011 with amendments.

備註(Note):

- 1. mg/kg = ppm; 0.1wt% = 1000ppm
- 2. mg/dm² = milligram per square decimeter (毫克/每100平方公分)
- 3. RL = Reporting Limit (報告極限值)
- 4. n.d. = Not Detected (未檢出) = Less than (小於) RL
- 5. 符合性結果之判定係以測試結果與限值做比較。(The statement of compliance conformity is based on comparison of testing results and limits.)
- 6. °C = degree Celsius (攝氏溫度)
- 7. 測試條件及模擬液是由客戶指定。 (Test condition and simulant were specified by client.)



號碼(No.): ETF20B00036

日期(Date): 02-Dec-2020

頁數(PAGE): 7 of 7

南亞塑膠工業股份有限公司 / NAN YA PLASTICS CORPORATION 嘉義縣新港鄉中洋村中洋工業區2號 / NO. 2, CHUNGYANG INDUSTRIAL PARK, HSINKANG VILLAGE, CHIAYI COUNTY, TAIWAN

* 照片中如有箭頭標示,則表示為實際檢測之樣品/部位。 * (The tested sample / part is marked by an arrow if it's shown on the photo.)

ETF20B00036



** 報告結尾 (End of Report) **