IC Knowledge – 2008 IC Cost Model Supported Processes List

May 13, 2008 the following processes are included in the 2008 IC Cost Model. The syntax is: wafer size (mm) – linewidth (nm) – process type and or company – polysilicon layers – metal layers and type. Processes are in order of wafer size (smallest to largest), linewidth (largest to smallest), process type and or company (alphabetical order), poly layers (least to most) and metal layers (least to most)

1. 100mm - 3.0µm - Bipolar - 2 layer aluminum
2. 100mm - 3.0µm - CMOS - 1 layer poly - 1 layer aluminum
3. 100mm - 2.0µm - CMOS - 1 layer poly - 2 layer aluminum
4. 100mm - 2.0µm - NMOS - 1 layer poly - 2 layer aluminum
5. 125mm - 3.0µm - Bipolar - 2 layer aluminum
6. 125mm - 2.0µm - NXP - Bipolar - 2 layer aluminum
7. 125mm - 2.0µm - CMOS - 1 layer poly - 2 layer aluminum
8. 125mm - 1.2µm - BiCMOS - 1 layer poly - 2 layer aluminum
9. 125mm - 1.0µm - NXP - BCDMOS - 2 layer aluminum
10. 150mm - 5.0µm - Infineon - Bipolar - 2 layer aluminum
11. 150mm - 4.0µm - Polar Fab - BP14 Bipolar - 1 layer aluminum
12. 150mm - 4.0µm - Polar Fab - BP14 Bipolar - 2 layer aluminum
13. 150mm - 3.0µm - Bipolar - 2 layer aluminum
14. 150mm - 3.0µm - Denso - BiCMOS on SOI - 3 layer aluminum
15. 150mm - 2.5µm - ADI MEMS Gyro - BiCMOS plus MEMS - 1 aluminum layer
16. 150mm - 2.5µm - X-Fab - DIMOST 500V SOI BCD - 1 poly layer - 2 aluminum layers
17. 150mm - 2.0µm - Bipolar - 2 layer aluminum
18. 150mm - 2.0µm - CMOS logic - 1 layer poly - 2 layer aluminum
19. 150mm - 1.5µm - CMOS - 1 layer poly - 2 layer aluminum
20. 150mm - 1.5µm - Polar Fab - PBC3 60V BCDMOS - 1 layer poly - 2 layer aluminum
21. 150mm - 1.25µm - Polar Fab - BP30 30V Bipolar - 1 layer aluminum
22. 150mm - 1.25µm - Polar Fab - BP30 30V Bipolar - 2 layer aluminum
23. 150mm - 1.2µm - AMI - CA BiCMOS - 1 layer poly - 2 layer aluminum
24. 150mm - 1.2µm - Bosch - BCDMOS + MEMS - 1 layer poly - 2 layer aluminum.
25. 150mm - 1.2µm - Bosch - BCDMOS - 1 layer poly - 3 layer aluminum.
26. 150mm - 1.2µm - Bosch - BCDMOS - 2 layer poly - 3 layer aluminum.
27. 150mm - 1.2µm - Bosch - CMOS - 1 layer poly - 3 layer aluminum.
28. 150mm - 1.2µm - CMOS logic - 1 layer poly - 2 layer aluminum
29. 150mm - 1.0µm - Bosch - BCDMOS - 1 layer poly - 3 layer aluminum.
30. 150mm - 1.0µm - Bosch - BCD3s BCDMOS - 2 layer poly - 3 layer aluminum.
31. 150mm - 1.0µm - Bosch - CMOS - 1 layer poly - 3 layer aluminum.
32. 150mm - 1.0µm - STMicro - BCDMOS - 1 layer poly - 3 layer aluminum.
33. 150mm - 1.0µm - STMicro - CMOS - 1 layer poly - 2 layer aluminum.
34. 150mm - 1.0µm - Tower - TS100 CMOS logic - 1 layer poly - 2 layer aluminum
35. 150mm - 1.0µm - X-Fab - XD10H 650V SOI BCD - 3 layer poly - 3 layer aluminum
36. 150mm - 1.0µm - X-Fab - XC10 Mixed Signal CMOS - 2 layer poly - 2 layer aluminum - pressure sensor

37. 150mm - 800nm - ASMC - BiCMOS - 1 layer poly - 3 layer aluminum
38. 150mm - 800nm - Bosch - BCDMOS - 1 layer poly - 3 layer aluminum.
39. 150mm - 800nm - Bosch - CMOS - 1 layer poly - 3 layer aluminum
40. 150mm - 800nm - CMOS logic - 1 layer poly - 2 layer aluminum
41. 150mm - 800nm - CMOS logic - 1 layer poly - 3 layer aluminum
42. 150mm - 800nm - Freescale - SMOS5 - 1 layer poly - 2 layer aluminum
43. 150mm - 800nm - Polar Fab - ABC3 BiCMOS - 1 layer poly - 2 layer aluminum
44. 150mm - 800nm - Polar Fab - ABC3 BiCMOS - 1 layer poly - 3 layer aluminum
45. 150mm - 800nm - Polar Fab - RFBC RF BiCMOS - 2 layer poly - 2 layer aluminum
46. 150mm - 800nm - Polar Fab - RFBC RF BiCMOS - 2 layer poly - 3 layer aluminum
47. 150mm - 800nm - STMicro - BCDMOS - 1 layer poly - 3 layer aluminum.
48. 150mm - 800nm - STMicro - CMOS - 1 layer poly - 3 layer aluminum.
49. 150mm - 800nm - Tower - TS80M CMOS logic - 2 layer poly - 3 layer aluminum
50. 150mm - 800nm - X-Fab - CX08 Mixed Signal HV CMOS w EEPROM - 2 layer poly - 3 layer aluminum
51. 150mm - 700nm - AMI - I2T30 30V BICMOS - 1 layer poly - 2 layer aluminum
52. 150mm - 700nm - AMI - I2T30E 30V BICMOS - 2 layer poly - 2 layer aluminum
53. 150mm - 700nm - AMI - I2T60 60V BICMOS - 2 layer poly - 2 layer aluminum
54. 150mm - 700nm - AMI - I2T100 100V BICMOS - 2 layer poly - 2 layer aluminum
55. 150mm - 700nm - Bosch - HC65 DOT BCDMOS - 2 layer poly - 3 layer aluminum.
56. 150mm - 700nm - MEMSIC CMOS plus MEMS - 1 layer poly - 2 layer aluminum
57. 150mm - 600nm - ADI - EP135 - CBiCMOS - poly-poly cap - 3 layer aluminum with thin film resistor
58. 150mm - 600nm - ST Micro - 80V BCD5 - 2 layer poly - 3 layer aluminum
59. 150mm - 600nm - Tower - TS60M CMOS logic - 2 layer poly - 3 layer aluminum
60. 150mm - 600nm - X-Fab - CX06 CMOS logic - 1 layer poly - 3 layer aluminum
61. 150mm - 600nm - X-Fab - XB06 BiCMOS - 2 layer poly - 3 layer aluminum
62. 150mm - 600nm - X-Fab - XC06 HV CMOS with Flash - 2 layer poly - 3 layer aluminum
63. 150mm - 500nm - Polar Fab - PBC4 40V BCDMOS - 2 layer poly - 2 layer aluminum
64. 150mm - 500nm - Polar Fab - PBC4 40V BCDMOS - 2 layer poly - 3 layer aluminum
65. 150mm - 500nm - TI - BiCMO2 - CBiCMOS - 3 layer aluminum with thin film resistors
66. 150mm - 500nm - Tower - TS50 CMOS Logic - 2 layer poly - 3 layer aluminum
67. 150mm - 450nm - NXP - BiMOS3 - 1 layer poly - 2 layer aluminum
68. 150mm - 350nm - AMI - I3T50 BCDMOS - 1 layer poly - 3 layer aluminum - MIM cap
69. 150mm - 350nm - AMI - I3T50 BCDMOS - 1 layer poly - 4 layer aluminum - MIM cap
70. 150mm - 350nm - AMI - I3T50 BCDMOS - 1 layer poly - 5 layer aluminum - MIM cap
71. 150mm - 350nm - Tower - TS35 CMOS Logic - 2 layer poly - 4 layer aluminum
72. 200mm - 800nm - CMOS logic - 1 layer poly - 2 layer aluminum
73. 200mm - 800nm - CMOS logic - 1 layer poly - 3 layer aluminum
74. 200mm - 800nm - Maxim - CB4 - CBiCMOS - vanadium schottky - 3 layer gold with thin film resistors
75. 200mm - 700nm - CMOS logic - 1 layer poly - 3 layer aluminum
76. 200mm - 700nm - TI - LBC4 - 2 layer poly - 3 layer aluminum
77. 200mm - 600nm - Chartered - Analog CMOS - 2 layer poly - 3 layer aluminum
78. 200mm - 600nm - Chartered - BiCMOS - 2 layer poly - 2 layer aluminum
79. 200mm - 600nm - Chartered - BiCMOS - 2 layer poly - 3 layer aluminum
80. 200mm - 600nm - Chartered - Digital CMOS - 1 layer poly - 3 layer aluminum
81. 200mm - 500nm - BiCMOS - 1 layer poly - 3 layer aluminum
82. 200mm - 500nm - Chartered - CMOS - 1 layer poly - 3 layer aluminum
83. 200mm - 500nm - CMOS logic - 1 layer poly - 2 layer aluminum
84. 200mm - 500nm - CMOS logic - 1 layer poly - 3 layer aluminum

85. 200mm - 500nm - CMOS logic - 1 layer poly - 4 layer aluminum
86. 200mm - 500nm - Freescale - dual gate ox CMOS Logic w Flash - 2 layer poly - 2 layer aluminum
87. 200mm - 500nm - Micronas - RFCMOS - 2 layer poly - 2 layer aluminum
88. 200mm - 500nm - Polar Fab - PBC4 40V BCDMOS - 2 layer poly - 2 layer aluminum
89. 200mm - 500nm - Polar Fab - PBC4 40V BCDMOS - 2 layer poly - 3 layer aluminum
90. 200mm - 500nm - TSMC - CMOS - 1 poly layer - 3 aluminum layers
91. 200mm - 350nm - BiCMOS logic - 1 layer poly - 5 layer aluminum
92. 200mm - 350nm - BiCMOS logic - 1 layer poly - 6 layer aluminum
93. 200mm - 350nm - Chartered - CMOS logic - 1 layer poly - 4 layer aluminum
94. 200mm - 350nm - Chartered - dual gate ox CMOS logic- 1 layer poly - 3 layer aluminum
95. 200mm - 350nm - Chartered - dual gate ox CMOS logic- 1 layer poly - 4 layer aluminum
96. 200mm - 350nm - Chartered - dual gate ox mixed signal CMOS - 2 layer poly - 4 layer aluminum
97. 200mm - 350nm - CMOS logic - 1 layer poly - 3 layer aluminum
98. 200mm - 350nm - CMOS logic - 1 layer poly - 4 layer aluminum
99. 200mm - 350nm - CMOS logic - 1 layer poly - 5 layer aluminum
100. 200mm - 350nm - CMOS logic - 1 layer poly - 6 layer aluminum
101. 200mm - 350nm - DRAM - 4 layer poly - 2 layer aluminum
102. 200mm - 350nm - Freescale - SMOS7 - 1 layer poly - 3 aluminum layers
103. 200mm - 350nm - Intel - BiCMOS logic - 1 layer poly - 4 layer aluminum
104. 200mm - 350nm - Intel - CMOS logic - 1 layer poly - 4 layer aluminum
105. 200mm - 350nm - NXP - CMOS logic with Flash - 2 layer poly - 5 layer aluminum
106. 200mm - 350nm - Polar Fab - BiCMOS Polar 35 - 2 layer poly - 2 layer aluminum
107. 200mm - 350nm - Polar Fab - BiCMOS Polar 35 - 2 layer poly - 3 layer aluminum
108. 200mm - 350nm - STMicro - BCD6 - 1 layer poly - 3 layer aluminum
109. 200mm - 350nm - STMicro - BCD6 - 1 layer poly - 4 layer aluminum
110. 200mm - 350nm - STMicro - BCD6 - 1 layer poly - 5 layer aluminum
111. 200mm - 350nm - TI - CMOS logic with Flash - 2 layer poly - 3 layer aluminum
112. 200mm - 350nm - TI - LBC5 - 2 layer poly - 3 layer aluminum
113. 200mm - 350nm - TSMC - CMOS - 1 layer poly - 4 layer aluminum
114. 200mm - 350nm - X-Fab - LV CMOS with EEPROM and Schottky - 2 layer poly - 4 layer aluminum
115. 200mm - 350nm - X-Fab - Mixed Signal CMOS - 2 layer poly - 4 layer aluminum
116. 200mm - 300nm to 350nm - SRAM - 2 layer poly - 2 layer aluminum
117. 200mm - 300nm to 350nm - SRAM - 4 layer poly - 2 layer aluminum
118. 200mm - 250nm - Chartered - dual gate oxide CMOS logic - 1 layer poly - 5 layer aluminum
119. 200mm - 250nm - DRAM - 4 layer poly - 2 layer aluminum
120. 200mm - 250nm - Freescale - CMOS logic with Flash - 2 poly layers - 3 aluminum layers
121. 200mm - 250nm - Freescale - CMOS logic with Flash - 2 poly layers - 4 aluminum layers
122. 200mm - 250nm - Freescale - SMOS8 - 1 poly layer - 4 aluminum layers
123. 200mm - 250nm - Infineon - SiGe - 2 layer poly - 3 layer aluminum with MIM capacitors
124. 200mm - 250nm - Intel - CMOS logic - 1 layer poly - 5 layer aluminum
125. 200mm - 250nm - Intel - ETOX VI Flash - 2 layer poly - 2 layer aluminum
126. 200mm - 250nm - Qimonda trench DRAM - 1 tungsten plus 2 alminum layers
127. 200mm - 250nm - RFCMOS - 1 layer poly - 4 layer aluminum with MIM capacitor
128. 200mm - 250nm - SRAM - 5 layer poly - 3 layer aluminum
129. 200mm - 250nm - Toshiba - NAND Flash - 4 layer poly - 1 tungsten and 2 aluminum layers
130. 200mm - 250nm - TSMC - single gate ox CMOS logic - 1 layer poly - 3 layer aluminum
131. 200mm - 250nm - TSMC - dual gate ox CMOS logic - 1 layer poly - 4 layer aluminum

132. 200mm - 250nm - TSMC - dual gate ox CMOS logic - 1 layer poly - 5 layer aluminum
133. 200mm - 220nm - Infineon - dual gate ox CMOS logic - 2 layer poly - 5 layer aluminum with Flash
134. 200mm - 180nm - Chartered - dual gate oxide CMOS logic - 1 layer poly - 6 layer aluminum
135. 200mm - 180nm - Chartered - Mixed Signal RF CMOS - 1 layer poly - 6 layer aluminum
136. 200mm - 180nm - DRAM - 4 layer poly - 3 layer aluminum
137. 200mm - 180nm - Freescale - dual gate ox RFCMOS - 1 layer poly - 4 layer copper with MIM
138. 200mm - 180nm - IBM - 7HP SiGe BiCMOS - 6 layer copper with single MIM and TaN resistor
139. 200mm - 180nm - IBM - 7RF RF CMOS - 3 layer Cu + 3 layer Al with single MIM and TaN resistor
140. 200mm - 180nm - IBM - 7SF dual gate ox CMOS Logic - 1 layer poly - 4 layer copper
141. 200mm - 180nm - IBM - 7SF dual gate ox CMOS Logic - 1 layer poly - 5 layer copper
142. 200mm - 180nm - IBM - 7SF dual gate ox CMOS Logic - 1 layer poly - 6 layer copper
143. 200mm - 180nm - IBM - 7WL SiGe BiCMOS - 3 layer Cu + 3 layer Al with single MIM and TaN resistor
144. 200mm - 180nm - IBM - eDRAM - 4 layer poly - 5 layer copper
145. 200mm - 180nm - IBM - eDRAM - 4 layer poly - 6 layer copper
146. 200mm - 180nm - Infineon - dual gate ox CMOS Logic - 1 layer poly - 4 layer copper w 1 aluminum layer + fuses
147. 200mm - 180nm - Intel - CMOS Logic - 1 layer poly - 6 layer aluminum - FSG ILD
148. 200mm - 180nm - Intel - ETOX VII Flash - 2 layer poly - 3 layer aluminum
149. 200mm - 180nm - NEC - dual gate ox CMOS logic - 1 layer poly - 5 aluminum layers
150. 200mm - 180nm - NXP - dual gate ox CMOS Logic - 1 poly layer - 1 tungsten and 6 aluminum layers
151. 200mm - 180nm - Renesas - CMOS Logic with Flash - 2 poly layers - 4 aluminum layers
152. 200mm - 180nm - Samsung - SRAM - 1 poly layer - 4 aluminum layers
153. 200mm - 180nm - SMIC - dual gate ox CMOS Logic - 1 layer poly - 6 layer aluminum - FSG ILD
154. 200mm - 180nm - SRAM - 5 layer poly - 3 layer aluminum
155. 200mm - 180nm - SSMC - dual gate ox CMOS logic - 1 poly layer - 6 aluminum layers - FSG ILD
156. 200mm - 180nm - STMicro - BCD8 - 1 layer poly - 4 aluminum layers - FSG
157. 200mm - 180nm - STMicro - BCD8 - 1 layer poly - 5 aluminum layers - FSG
158. 200mm - 180nm - STMicro - BCD8 - 1 layer poly - 6 aluminum layers - FSG
159. 200mm - 180nm - TI - CMOS Logic with Flash - 2 layer poly - 4 layer aluminum - FSG ILD
160. 200mm - 180nm - TI - CMOS Logic - 1 layer poly - 5 layer aluminum - FSG ILD
161. 200mm - 180nm - TI - CMOS Logic - 1 layer poly - 5 layer copper - FSG ILD
162. 200mm - 180nm - Toshiba - dual gate oxide CMOS logic - 1 layer poly - 4 layer aluminum
163. 200mm - 180nm - Tower - TS18SL dual gate oxide CMOS logic - 1 layer poly - 6 layer aluminum - FSG ILD
164. 200mm - 180nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 5 layer aluminum - FSG ILD
165. 200mm - 180nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 6 layer aluminum - FSG ILD
166. 200mm - 180nm - TSMC - dual gate RFCMOS - 1 layer poly - 4 layer aluminum - FSG ILD

167. 200mm - 180nm - UMC - dual gate ox CMOS Logic - 1 layer poly - 5 layer aluminum - FSG ILD
168. 200mm - 180nm - UMC - dual gate ox CMOS Logic - 1 layer poly - 6 layer aluminum - FSG ILD
169. 200mm - 170nm - Infineon - NAND Flash - 1 layer poly - 1 tungsten and 2 aluminum layers
170. 200mm - 170nm - Qimonda trench DRAM - 1 tungsten plus 2 alminum layers
171. 200mm - 170nm - Toshiba - NAND Flash - 4 layer poly - 1 tungsten and 2 aluminum layers
172. 200mm - 160nm - Tower - dual gate ox CMOS Logic - 1 layer poly - 5 layer aluminum - FSG
173. 200mm - 150nm - Micron - CMOS image sensor - 2 layer poly - 5 aluminum layers
174. 200mm - 150nm - Samsung - NAND Flash - 4 layer poly - 1 tungsten and 1 aluminum layer
175. 200mm - 150nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 5 layer copper with aluminum bond pads - FSG ILD
176. 200mm - 150nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 6 layer copper - FSG ILD
177. 200mm - 150nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 7 layer copper - FSG ILD
178. 200mm - 150nm - UMC - dual gate ox CMOS Logic - 1 layer poly - 8 layer aluminum - FSG ILD
179. 200mm - 140nm - Qimonda Trench DRAM - 1 tungsten and 2 aluminum layers
180. 200mm - 140nm - Toshiba - TC260 dual gate ox CMOS with trench DRAM - 7 layer copper
181. 200mm - 130nm - DRAM - 4 layer poly - 3 layer aluminum
182. 200mm - 130nm - IBM - 8HP SiGe BiCMOS - 6 layer copper with single MIM and TaN resistor
183. 200mm - 130nm - IBM - 8HP SiGe BiCMOS - 7 layer copper with single MIM and TaN resistor
184. 200mm - 130nm - IBM - 8HP SiGe BiCMOS - 8 layer copper with single MIM and TaN resistor
185. 200mm - 130nm - IBM - 8RF RF CMOS - with Cu-Cu-Cu-Al-CU-Al and single MIM and TaN resistor
186. 200mm - 130nm - IBM - 8SFG dual gate ox CMOS Logic - 1 layer poly - 6 layer copper
187. 200mm - 130nm - IBM - 8SFG dual gate ox CMOS Logic - 1 layer poly - 7 layer copper
188. 200mm - 130nm - IBM - 8SFG dual gate ox CMOS Logic - 1 layer poly - 8 layer copper
189. 200mm - 130nm - IBM - 9S dual gate ox CMOS Logic - 1 layer poly - 6 layer copper - SiLK ILD
190. 200mm - 130nm - IBM - 9S dual gate ox CMOS Logic - 1 layer poly - 7 layer copper - SiLK ILD
191. 200mm - 130nm - IBM - 9S dual gate ox CMOS Logic - 1 layer poly - 8 layer copper - SiLK ILD
192. 200mm - 130nm - Infineon - RFCMOS - 1 layer poly - 4 copper and 2 aluminum layers with MIM
193. 200mm - 130nm - Intel - CMOS Logic - 1 layer poly - 6 layer copper - FSG ILD
194. 200mm - 130nm - Intel - ETOX VIII Flash - 2 layer poly - 3 layer aluminum
195. 200mm - 130nm - TI - CMOS Logic - 1 layer poly - 5 layer copper - FSG ILD
196. 200mm - 130nm - TI - CMOS Logic - 1 layer poly - 5 layer copper with 1 layer aluminum - FSG ILD
197. 200mm - 130nm - TI - CMOS Logic - 1 layer poly - 6 layer copper with 1 layer aluminum - FSG ILD
198. 200mm - 130nm - Toshiba - NAND Flash - 3 layer poly - 1 tungsten and 2 aluminum layers

199. 200mm - 130nm - Tower - TS13SL dual gate oixde CMOS logic - 1 layer poly - 6 layer copper - FSG ILD
200. 200mm - 130nm - Tower - TS13SL dual gate oixde CMOS logic - 1 layer poly - 7 layer copper - FSG ILD
201. 200mm - 130nm - Tower - TS13SL dual gate oixde CMOS logic - 1 layer poly - 8 layer copper - FSG ILD
202. 200mm - 130nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 6 layer copper - FSG ILD
203. 200mm - 130nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 6 copper, 1 aluminum layer - FSG ILD
204. 200mm - 130nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 7 layer copper - FSG ILD
205. 200mm - 130nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 8 layer copper - FSG ILD
206. 200mm - 130nm - UMC - L130 dual gate ox CMOS Logic - 1 layer poly - 6 layer copper - FSG ILD
207. 200mm - 130nm - UMC - L130 dual gate ox CMOS Logic - 1 layer poly - 6 layer copper with 1 aluminum layer - FSG ILD
208. 200mm - 130nm - UMC - L130 dual gate ox CMOS Logic - 1 layer poly - 7 layer copper - FSG ILD
209. 200mm - 130nm - UMC - L130 dual gate ox CMOS Logic - 1 layer poly - 8 layer copper - FSG ILD
210. 200mm - 120nm - Samsung - NAND Flash - 4 layer poly - 1 tungsten and 1 aluminum layer
211. 200mm - 120nm - Samsung - SRAM - 1 layer poly - 4 copper layers
212. 200mm - 110nm - Samsung - DRAM - 7 layer poly - 3 layer metal (1W + 2Al)
213. 200mm - 110nm - Toshiba - TC280 dual gate ox CMOS with trench DRAM - 7 layer copper
214. 200mm - 110nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 6 layer copper - FSG ILD
215. 200mm - 110nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 7 layer copper - FSG ILD
216. 200mm - 110nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 8 layer copper - FSG ILD
217. 200mm - 90nm - AMD - dual gate ox strained silicon CMOS logic - 1 layer poly - 9 layer copper - SiOC ILD - SOI
218. 200mm - 90nm - Intel - ETOX IX Flash - 2 layer poly - 3 layer copper with aluminum bond pads
219. 200mm - 90nm - Samsung - DRAM - 7 layer poly - 3 layer metal (1W + 2Al)
220. 200mm - 90nm - Samsung - NAND Flash - 4 layer poly - 1 tungsten and 1 aluminum layer
221. 200mm - 90nm - Spansion - Floating Gate NOR Flash
222. 200mm - 90nm - Spansion - Mirror Bit NOR Flash
223. 200mm - 90nm - Toshiba - NAND Flash - 3 layer poly - 1 tungsten and 2 aluminum layers
224. 200mm - Flip Chip Bump - electroplated
225. 200mm - SiMOX
226. 300mm - 150nm - Samsung NAND Flash - 7 layer poly - 1 tungsten and 1 aluminum layer
227. 300mm - 150nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 6 layer copper - FSG ILD
228. 300mm - 150nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 7 layer copper - FSG ILD
229. 300mm - 150nm - UMC - dual gate ox CMOS Logic - 1 layer poly - 8 layer aluminum - FSG ILD

230. 300mm - 130nm - Chartered - dual gate oxide CMOS Logic - 1 layer poly - 8 layer copper - FSG ILD
231. 300mm - 130nm - IBM - 8HP SiGe BiCMOS - 6 layer copper with single MIM and TaN resistor
232. 300mm - 130nm - IBM - 8HP SiGe BiCMOS - 7 layer copper with single MIM and TaN resistor
233. 300mm - 130nm - IBM - 8HP SiGe BiCMOS - 8 layer copper with single MIM and TaN resistor
234. 300mm - 130nm - IBM - 8RF RF CMOS - with Cu-Cu-Cu-Al-CU-Al and single MIM and TaN resistor
235. 300mm - 130nm - IBM - 8SFG dual gate ox CMOS Logic - 1 layer poly - 6 layer copper
236. 300mm - 130nm - IBM - 8SFG dual gate ox CMOS Logic - 1 layer poly - 7 layer copper
237. 300mm - 130nm - IBM - 8SFG dual gate ox CMOS Logic - 1 layer poly - 8 layer copper
238. 300mm - 130nm - IBM - 9S dual gate ox CMOS Logic - 1 layer poly - 6 layer copper - SiLK ILD
239. 300mm - 130nm - IBM - 9S dual gate ox CMOS Logic - 1 layer poly - 7 layer copper - SiLK ILD
240. 300mm - 130nm - IBM - 9S dual gate ox CMOS Logic - 1 layer poly - 8 layer copper - SiLK ILD
241. 300mm - 130nm - Intel - CMOS Logic - 1 layer poly - 6 layer copper - FSG ILD
242. 300mm - 130nm - Renesas - dual gate oxide CMOS Logic - 1 poly layer - 1 tungsten, 5 copper and 1 aluminum layer
243. 300mm - 130nm - TI - CMOS Logic - 1 layer poly - 5 layer copper - FSG ILD
244. 300mm - 130nm - TI - CMOS Logic - 1 layer poly - 5 layer copper with 1 layer aluminum - FSG ILD
245. 300mm - 130nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 6 layer copper - FSG ILD
246. 300mm - 130nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 7 layer copper - FSG ILD
247. 300mm - 130nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 8 layer copper - FSG ILD
248. 300mm - 130nm - UMC - L130 dual gate ox CMOS Logic - 1 layer poly - 6 layer copper - FSG ILD
249. 300mm - 130nm - UMC - L130 dual gate ox CMOS Logic - 1 layer poly - 7 layer copper - FSG ILD
250. 300mm - 130nm - UMC - L130 dual gate ox CMOS Logic - 1 layer poly - 8 layer copper - FSG ILD
251. 300mm - 130nm - UMC - L130 dual gate ox CMOS Logic - 1 layer poly - 8 copper and 1 aluminum layers - FSG ILD
252. 300mm - 120nm - Samsung NAND Flash - 4 layer poly - 1 tungsten and 1 aluminum layer
253. 300mm - 110nm - Qimonda trench DRAM - 1 tungsten and 2 aluminum layers
254. 300mm - 110nm - Samsung DRAM - 7 layer poly - 3 layer metal (1W + 2Al)
255. 300mm - 110nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 6 layer copper - FSG ILD
256. 300mm - 110nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 7 layer copper - FSG ILD
257. 300mm - 110nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 8 layer copper - FSG ILD
258. 300mm - 90nm - AMD - dual gate ox strained silicon CMOS logic - 1 layer poly - 9 layer copper - SiOC ILD - SOI

259. 300mm - 90nm - Chartered - Common Platform - dual gate ox CMOS logic - 1 layer poly - 9 layer copper - SiOC ILD
260. 300mm - 90nm - Chartered - Common Platform - dual gate ox CMOS logic - 1 layer poly - 10 layer copper - SiOC ILD
261. 300mm - 90nm - Chartered - Common Platform - triple gate ox CMOS logic - 1 layer poly - 10 layer copper - SiOC ILD
262. 300mm - 90nm - Freescale - dual gate ox CMOS Logic - 1 layer poly - 6 layer copper - SiOC ILD
263. 300mm - 90nm - Freescale - triple gate ox CMOS Logic - 1 layer poly - 6 layer copper - SiOC ILD - SOI
264. 300mm - 90nm - IBM - Common Platform - dual gate ox CMOS logic - 1 layer poly - 9 layer copper - SiOC ILD
265. 300mm - 90nm - IBM - Common Platform - dual gate ox CMOS logic - 1 layer poly - 10 layer copper - SiOC ILD
266. 300mm - 90nm - IBM - Common Platform - triple gate ox CMOS logic - 1 layer poly - 10 layer copper - SiOC ILD
267. 300mm - 90nm - IBM - dual gate oxide - 1 layer poly - 9 layer copper - SiOC ILD - SOI
268. 300mm - 90nm - Intel - SiGe Communications process
269. 300mm - 90nm - Intel - Strained Silicon CMOS Logic - 1 layer poly - 7 layer copper - SiOC ILD
270. 300mm - 90nm - Qimonda trench DRAM - 1 tungsten and 2 aluminum layers
271. 300mm - 90nm - Samsung - Common Platform - dual gate ox CMOS logic - 1 layer poly - 9 layer copper - SiOC ILD
272. 300mm - 90nm - Samsung - Common Platform - dual gate ox CMOS logic - 1 layer poly - 10 layer copper - SiOC ILD
273. 300mm - 90nm - Samsung - Common Platform - triple gate ox CMOS logic - 1 layer poly - 10 layer copper - SiOC ILD
274. 300mm - 90nm - Samsung - DRAM - RCAT - 7 layer poly - 3 layer metal (1W + 2Al)
275. 300mm - 90nm - Samsung - eDRAM - 8 copper layers and 1 aluminum layer
276. 300mm - 90nm - Samsung - NAND Flash - 4 layer poly - 2 tungsten and 1 aluminum layers
277. 300mm - 90nm - Sony - eDRAM - 4 poly layer - 5 copper and 1 aluminum layer - SiOC/FSG ILD
278. 300mm - 90nm - Sony - eDRAM - 4 poly layer - 11 layer copper - SiOC/FSG ILD
279. 300mm - 90nm - TI - dual gate oxide CMOS Logic - 1 layer poly - 5 layer copper and 1 layer aluminum - SiOC ILD
280. 300mm - 90nm - TI - dual gate oxide CMOS Logic - 1 layer poly - 6 layer copper - SiOC ILD
281. 300mm - 90nm - TI - dual gate oxide CMOS Logic - 1 layer poly - 6 layer copper and 1 layer aluminum - SiOC ILD
282. 300mm - 90nm - TI - dual gate oxide CMOS Logic - 1 layer poly - 9 layer copper - SiOC ILD
283. 300mm - 90nm - Toshiba - NAND Flash - 4 layer poly - 1 tungsten and 1 aluminum layers
284. 300mm - 90nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 6 layer copper and 1 aluminum layer- SiOC ILD
285. 300mm - 90nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 7 layer copper - SiOC ILD
286. 300mm - 90nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 8 layer copper - SiOC ILD
287. 300mm - 90nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 9 layer copper - SiOC ILD

288. 300mm - 90nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 9 copper and 1 aluminum layer - SiOC ILD
289. 300mm - 90nm - TSMC - triple gate ox CMOS Logic - 1 layer poly - 9 layer copper - SiOC ILD
290. 300mm - 90nm - TSMC - triple gate ox RFCMOS Logic - 2 layer poly - 9 layer copper - SiOC ILD
291. 300mm - 90nm - UMC - L90 dual gate ox CMOS Logic - 1 layer poly - 7 layer copper - SiOC ILD
292. 300mm - 90nm - UMC - L90 dual gate ox CMOS Logic - 1 layer poly - 8 layer copper - SiOC ILD
293. 300mm - 90nm - UMC - L90 dual gate ox CMOS Logic - 1 layer poly - 9 layer copper - SiOC ILD
294. 300mm - 90nm - UMC - L90 dual gate ox CMOS Logic - 1 layer poly - 9 copper and 1 aluminum layer - SiOC ILD
295. 300mm - 80nm - Qimonda trench DRAM - 1 tungsten and 2 aluminum layers
296. 300mm - 80nm - Samsung - DRAM RCAT + MESH - 7 layer poly - 3 layer metal (1W + 2Al)
297. 300mm - 75nm - Qimonda trench DRAM - 1 tungsten and 2 aluminum layers
298. 300mm - 73nm - Samsung - NAND Flash - 4 layer poly - 1 tungsten and 2 aluminum layers
299. 300mm - 70nm - Samsung - DRAM - S-RCAT + MESH 7 layer poly - 3 layer metal (1W + 2Al)
300. 300mm - 70nm - Toshiba - NAND Flash - 4 layer poly - 1 tungsten and 2 aluminum layers
301. 300mm - 65nm - AMD - Strained Silicon dual gate ox SOI CMOS - 1 layer poly - 10 layer copper - SiOC ILD
302. 300mm - 65nm - Chartered - Common Platform - dual gate ox CMOS logic - 1 layer poly - 9 layer copper - SiOC ILD
303. 300mm - 65nm - Chartered - Common Platform - dual gate ox CMOS logic - 1 layer poly - 10 layer copper - SiOC ILD
304. 300mm - 65nm - Chartered - Common Platform - triple gate ox CMOS logic - 1 layer poly - 10 layer copper - SiOC ILD
305. 300mm - 65nm - Freescale - dual gate ox CMOS logic - 1 layer poly - 7 layer copper with MIM caps - SiOC ILD
306. 300mm - 65nm - IBM - Common Platform - dual gate ox CMOS logic - 1 layer poly - 9 layer copper - SiOC ILD
307. 300mm - 65nm - IBM - Common Platform - dual gate ox CMOS logic - 1 layer poly - 10 layer copper - SiOC ILD
308. 300mm - 65nm - IBM - Common Platform - triple gate ox CMOS logic - 1 layer poly - 10 layer copper - SiOC ILD
309. 300mm - 65nm - Intel - Strained Silicon CMOS Logic - 1 layer poly - 8 layer copper - SiOC ILD
310. 300mm - 65nm - Qimonda trench DRAM - 1 tungsten and 2 aluminum layers
311. 300mm - 65nm - Samsung - Common Platform - dual gate ox CMOS logic - 1 layer poly - 9 layer copper - SiOC ILD
312. 300mm - 65nm - Samsung - Common Platform - dual gate ox CMOS logic - 1 layer poly - 10 layer copper - SiOC ILD
313. 300mm - 65nm - Samsung - Common Platform - triple gate ox CMOS logic - 1 layer poly - 10 layer copper - SiOC ILD
314. 300mm - 65nm - Samsung - NAND Flash - 4 layer poly - 1 tungsten and 2 aluminum layers
315. 300mm - 65nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 6 layer copper - SiOC ILD

316. 300mm - 65nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 7 layer copper - SiOC ILD
317. 300mm - 65nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 8 layer copper - SiOC ILD
318. 300mm - 65nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 9 layer copper - SiOC ILD
319. 300mm - 65nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 10 layer copper - SiOC ILD
320. 300mm - 58nm - Qimonda trench DRAM - 1 tungsten and 2 aluminum layers
321. 300mm - 56nm - Toshiba - NAND Flash - 4 layer poly - 1 tungsten layer and 2 aluminum layers
322. 300mm - 51nm - Samsung - NAND Flash - 4 layer poly - 1 tungsten and 2 aluminum layers
323. 300mm - 45nm - AMD - Strained Silicon dual gate ox SOI CMOS - 1 layer poly - 10 layer copper - SiOC ILD
324. 300mm - 45nm - Chartered - Common Platform - dual gate ox CMOS logic - 1 layer poly - 9 layer copper - SiOC ILD
325. 300mm - 45nm - Chartered - Common Platform - dual gate ox CMOS logic - 1 layer poly - 10 layer copper - SiOC ILD
326. 300mm - 45nm - Chartered - Common Platform - triple gate ox CMOS logic - 1 layer poly - 10 layer copper - SiOC ILD
327. 300mm - 45nm - Freescale - low power triple gate ox CMOS - 1 layer poly - 9 copper layers - SiOC ILD
328. 300mm - 45nm - IBM - Common Platform - dual gate ox CMOS logic - 1 layer poly - 9 layer copper - SiOC ILD
329. 300mm - 45nm - IBM - Common Platform - dual gate ox CMOS logic - 1 layer poly - 10 layer copper - SiOC ILD
330. 300mm - 45nm - IBM - Common Platform - triple gate ox CMOS logic - 1 layer poly - 10 layer copper - SiOC ILD
331. 300mm - 45nm - Intel - strained silicon high-k with dual metal gate CMOS - 9 layer copper - SiOC ILD
332. 300mm - 45nm - Toshiba - dual gate ox CMOS Logic - 1 layer poly - 10 layer copper - SiOC ILD
333. 300mm - 45nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 9 layer copper - SiOC ILD
334. 300mm - 45nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 10 layer copper - SiOC ILD
335. 300mm - 45nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 11 layer copper - SiOC ILD
336. 300mm - 45nm - TSMC - triple gate ox CMOS Logic - 1 layer poly - 11 layer copper - SiOC ILD
337. 300mm - 43nm - Toshiba - NAND Flash - 4 layer poly with High-k interlevel - 3 layer copper
338. 300mm - 45nm - Samsung - Common Platform - dual gate ox CMOS logic - 1 layer poly - 9 layer copper - SiOC ILD
339. 300mm - 45nm - Samsung - Common Platform - dual gate ox CMOS logic - 1 layer poly - 10 layer copper - SiOC ILD
340. 300mm - 45nm - Samsung - Common Platform - triple gate ox CMOS logic - 1 layer poly - 10 layer copper - SiOC ILD
341. 300mm - 40nm - Samsung - TANOS NAND Flash - 4 layer poly - 1 tungsten and 2 aluminum layers

342. 300mm - 40nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 9 layer copper - SiOC ILD
343. 300mm - 40nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 10 layer copper - SiOC ILD
344. 300mm - 40nm - TSMC - dual gate ox CMOS Logic - 1 layer poly - 11 layer copper - SiOC ILD
345. 300mm - 40nm - TSMC - triple gate ox CMOS Logic - 1 layer poly - 11 layer copper - SiOC ILD
346. 300mm - 32nm - Intel - PROJECTED strained silicon high-k with dual metal gate CMOS - 10 layer copper - SiOC ILD
347. 300mm - 32nm - Samsung - PROJECTED TANOS NAND Flash - 4 layer poly - 3 copper layers
348. 300mm - 32nm - Toshiba - PROJECTED NAND Flash - 4 layer poly with High-k interlevel - 3 layer copper
349. 300mm - 22nm - Intel - PROJECTED strained silicon high-k with dual metal gate CMOS - 11 layer copper - SiOC ILD
350. 300mm - 22nm - Samsung - PROJECTED TANOS NAND Flash - 4 layer poly - 3 copper layers
351. 300mm - Flip Chip Bump - electroplated
352. 300mm - SiMOX
353. 450mm - 22nm - Intel - PROJECTED strained silicon high-k with dual metal gate CMOS - 11 layer copper - SiOC ILD
354. 450mm - 22nm - Samsung - PROJECTED TANOS NAND Flash - 4 layer poly - 3 copper layers
355. 450mm - SiMOX