

S_1

B

A

AB

00 01 11 10

CD

00 01 11 10

D

C

0	1	0	1
0	0	0	0
0	0	0	0
0	0	0	0

0000 0100 1100 1000

0001 0101 1101 1001

0011 0111 1111 1011

0010 0110 1110 1010

$$S_0 = \underline{\overline{A}B\overline{C}\overline{D}} + \underline{A\overline{B}\overline{C}\overline{D}}$$