

T

V

K

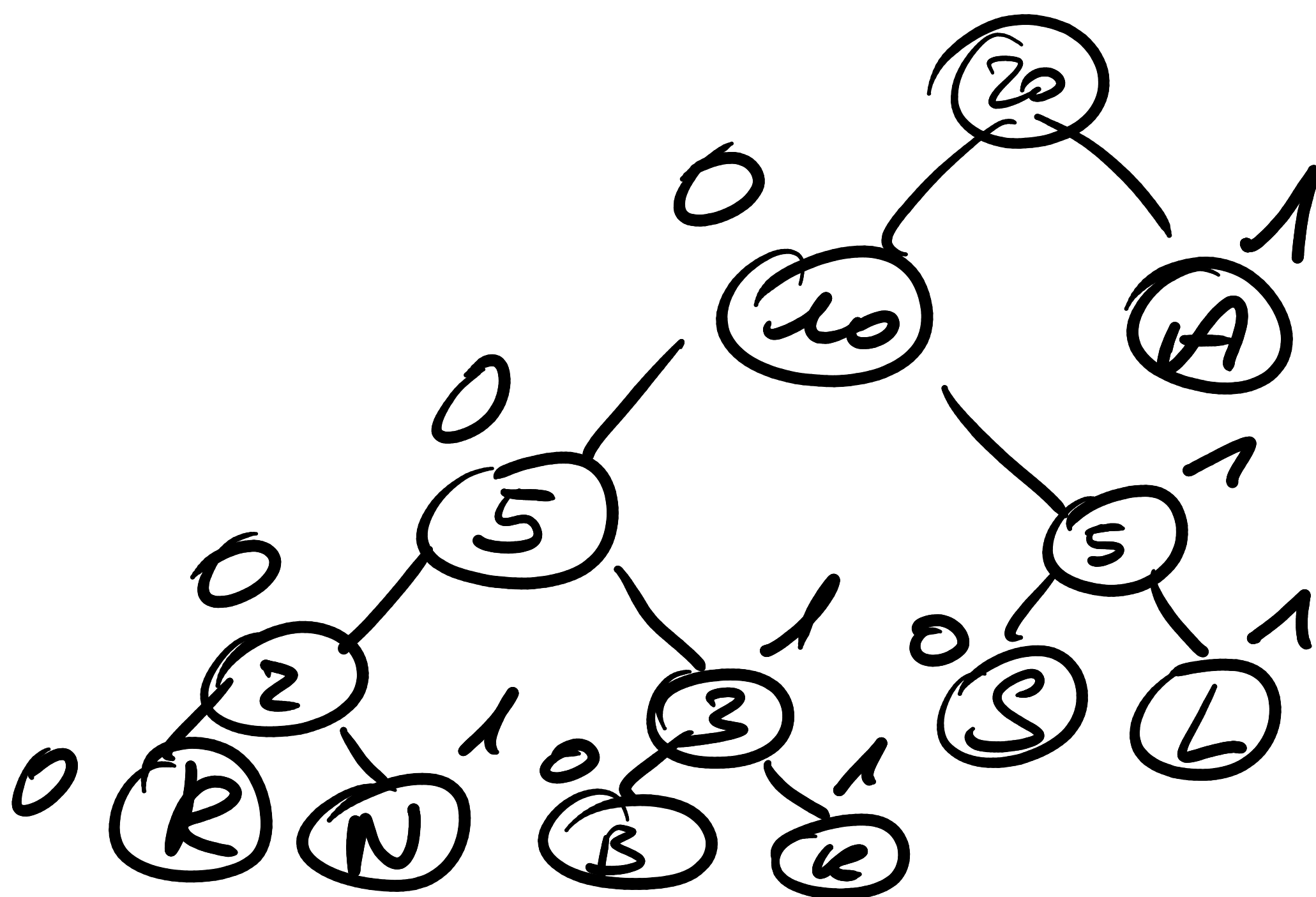
Kodowanie Shannona i Huffman

ALASKA LABA ~~MA~~ ARKANSAS

A - 10,
L - 2,
S - 3,
K - 2,
B - 1,
R - 1
N - 1

Huffman

A - 1
S - 010
L - 011
K - 0011
B - 0010
N - 0001
R - 0000



Shannon

Entropia

A - 10,
 L - 2,
 S - 3,
 K - 2,
 B - 1,
 R - 1,
 N - 1,

A	S	L	K	B	R	N
10	3	2	2	1	1	1
10	10					
0	1					
5			5			
0			1			
3	2	1	2	3		
0	1	1	0	1		
				1	2	
				0	1	
				1		
				0		
				1		
				0		
				1		

A - 0
 S - 100
 L - 101
 K - 110
 B - 1110
 R - 11110
 N - 11111

A	S	L	K	B	R	N
10	3	2	2	1	1	1
0				1		
	0			1		
	1	0		1		
			0		1	
				0		1
					0	1

A	S	L	K	B	R	N
10	3	2	2	1	1	1
0				1		
	0			1		
	1	0		1		
			0		1	
				0		1
					0	1

$$-\sum_{i=1}^n p_i \log_2 p_i$$

1,6	0	1,3
1,2		
0,4	0,7	3
0,2	0,4	6
	0,8	
	6	

A - 10,	0,5	$0_{10} = 0,0000$	0
S - 3,	0,15	$0,5_{10} = 0,10000$	10
L - 2,	0,1	$0,65_{10} = 0,10100$	101
K - 2,	0,1	$0,75 = 0,11000$	110
B - 1,	0,05		
R - 1,	0,05	$0,80 = 0,11001$	11001
N - 1,	0,05	$0,85 = 0,10110$	10110

W zad. 2. 4 bit zamieniamy na
preludy.

$$g(x) = x^3 + x^2 + 1 = 1101$$

	$d(x)$		$\cdot x^3$	$r(x)$	$d(x) + r(x)$
1	000	0	0	000	000 000
2	001	1	x^3	101	001 101
3	010	x	x^4	111	010 111
4	011	$x+1$	x^4+x^3	010	011 010
5	100	x^2	x^5	011	100 011
6	101	x^2+1	x^5+x^3	110	101 110
7	110	x^2+x	x^5+x^4	100	110 100
8	111	x^2+x+1	$x^5+x^4+x^3$	001	111 001

001 000