$_s ig_m 1_p 2.bmp Superimposed levels and the corresponding received signals in the case of and.$
?
U
?
U =
2
U =
3
?
S[l]
l ∈
{0, 1, · · · , 2^{mU}}
U
2^{mU}
N_t
N_t
m =
1
U =
2
??
U
?
S

$$\phi = \sum_{x \in X} s \in Smin \parallel x - s \parallel^2, \tag{1}$$

X
φ
2^{mU}
2^{mP}
?
ε
−ϵ
S =
{ϵ, −ϵ}
M =
2
M
S
ρ_i
i ∈
{1, 2, ..., M}
ρ_i
q_{2i−1} =
ρ_i +
ϵ
q_{2i} =
ρ_i −
ϵ
i ∈
{1, 2, ..., M}
S =
{q_i | i =
1, 2, ..., 2M}
M
2M
M =
2^{mU}
$_s plitting.png Splitting from toget ϵ$
q −
ε
ε
?
D(r)
r
q_1
i =
1
q_{i+1}
D^2(r)
i
i +
1
i =
2^{mU}
?
Ω
q_{i+1}
D(r)
r
q_1
i =
1
D(r)
r ∈
r
{q_1, ..., q_i}
Ω
n/(2^{mU})
D(r)
r \
Ω
q_{i+1}
Ω
D^2(r)
i
i +
1