#### Report

#### 30 October 2022, 22:29

- Report
  - Rewards
    - Rewards notes
    - Rewards chart
    - Rewards histogram
  - Delta
    - Delta notes
    - Delta chart
    - Delta histogram
  - o Discount 0.999 rewards
    - Discount 0.999 rewards notes
    - Discount 0.999 rewards chart
    - Discount 0.999 rewards histogram
  - Halt max prob.
    - Halt max prob. notes
    - Halt max prob. chart
    - Halt max prob. histogram
  - Direction max prob.
    - Direction max prob. notes
    - Direction max prob. chart
    - Direction max prob. histogram
  - Speed max prob.
    - Speed max prob. notes
    - Speed max prob. chart
    - Speed max prob. histogram
  - Sensor direction max prob.
    - Sensor direction max prob. notes
    - Sensor direction max prob. chart
    - Sensor direction max prob. histogram
  - · Delta halt prob.
    - Delta halt prob. notes
    - Delta halt prob. chart
    - Delta halt prob. histogram
  - o Delta direction prob.
    - Delta direction prob. notes
    - Delta direction prob. chart
    - Delta direction prob. histogram
  - Delta speed prob.
    - Delta speed prob. notes
    - Delta speed prob. chart
    - Delta speed prob. histogram
  - o Delta sensor direction prob.
    - Delta sensor direction prob. notes
    - Delta sensor direction prob. chart

- Delta sensor direction prob. histogram
- Advantage residual estimation (critic)
  - Advantage residual estimation (critic) notes
  - Advantage residual estimation (critic) chart
  - Advantage residual estimation (critic) histogram
- Halt gradient
  - Halt gradient notes
  - Halt gradient chart
  - Halt gradient histogram
- Direction gradient
  - Direction gradient notes
  - Direction gradient chart
  - Direction gradient histogram
- Speed gradient
  - Speed gradient notes
  - Speed gradient chart
  - Speed gradient histogram
- Sensor direction gradient
  - Sensor direction gradient notes
  - Sensor direction gradient chart
  - Sensor direction gradient histogram

Data folder: C:\Users\marco\Desktop\wheellyj\data\agent-3e-3\

#### Rewards

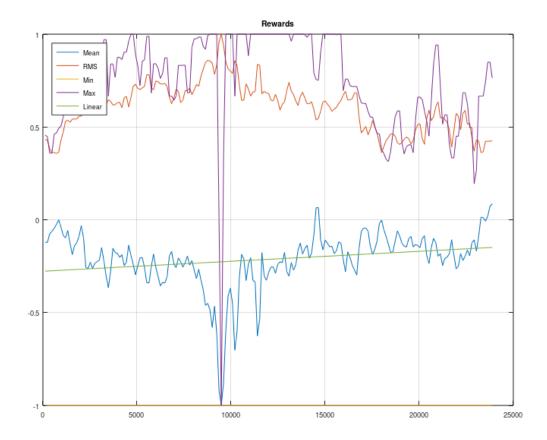
КРІ	
Mean	-0.213
RMS	0.619
Min	-1
Median	0
Max	1
Trend	Linear
From	-0.277
То	-0.148

-0.909	-0.727	-0.545	-0.364	-0.182	0	0.182	0.364	0.545	0.727	0.909	
7786	0	0	0	0	9830	1876	2210	777	1200	321	

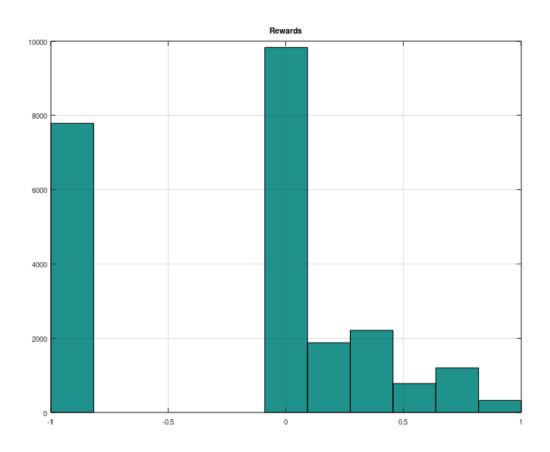
#### **Rewards notes**

[Notes]

#### **Rewards chart**



#### Rewards histogram



#### Delta

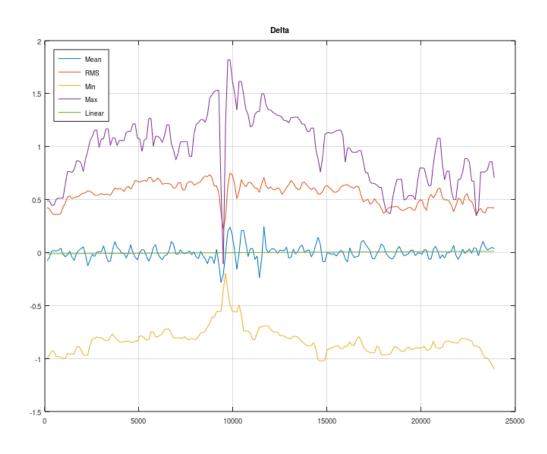
KPI	
Mean	0.000479
RMS	0.564
Min	-1.1
Median	0.153
Max	1.82
Trend	Linear
From	-0.0116
То	0.0126

-0.964	-0.699	-0.434	-0.169	0.0963	0.361	0.626	0.891	1.16	1.42	1.69
1975	4582	885	429	7389	4579	2359	1344	343	100	15

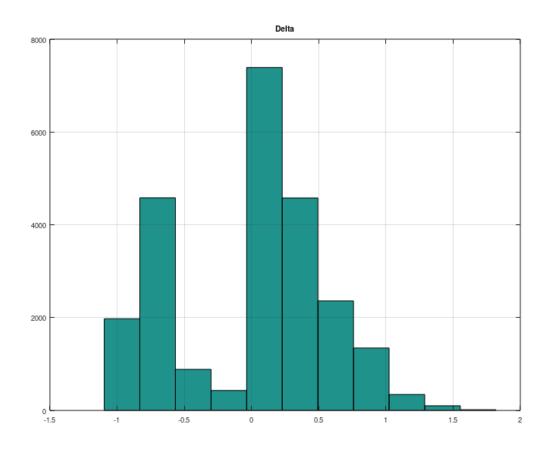
#### **Delta notes**

[Notes]

#### **Delta chart**



#### Delta histogram



#### Discount 0.999 rewards

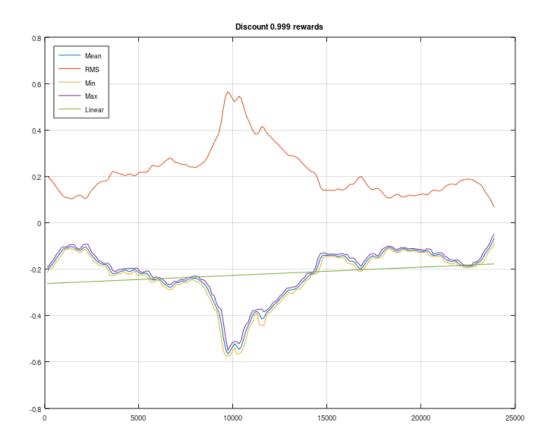
КРІ	
Mean	-0.22
RMS	0.246
Min	-0.574
Median	-0.187
Max	-0.0488
Trend	Linear
From	-0.262
То	-0.177

-0.55	-0.502	-0.455	-0.407	-0.359	-0.311	-0.264	-0.216	-0.168	-0.12	-0.0727	
740	430	438	781	1135	894	3549	3637	5345	6639	412	

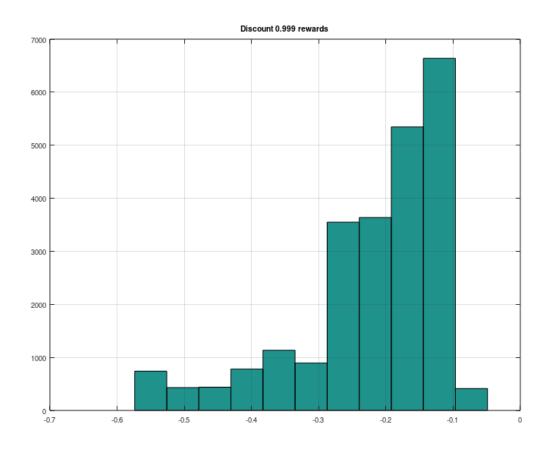
#### Discount 0.999 rewards notes

[Notes]

#### Discount 0.999 rewards chart



Discount 0.999 rewards histogram



# Halt max prob.

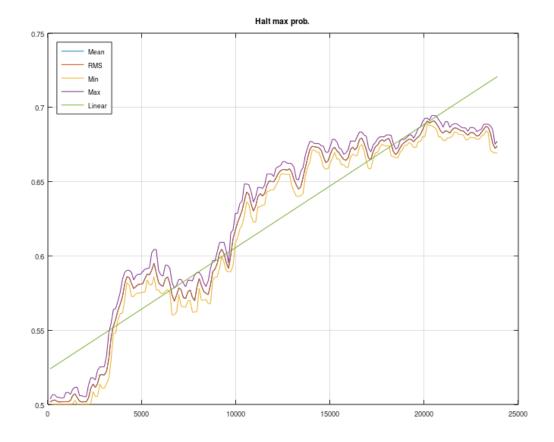
KPI	
Mean	0.622
RMS	0.625
Min	0.5
Median	0.648
Max	0.695
Trend	Linear
From	0.523
То	0.722

0.509	0.527	0.544	0.562	0.58	0.597	0.615	0.633	0.65	0.668	0.686
2742	524	252	866	3953	1348	453	1047	2305	5116	5394

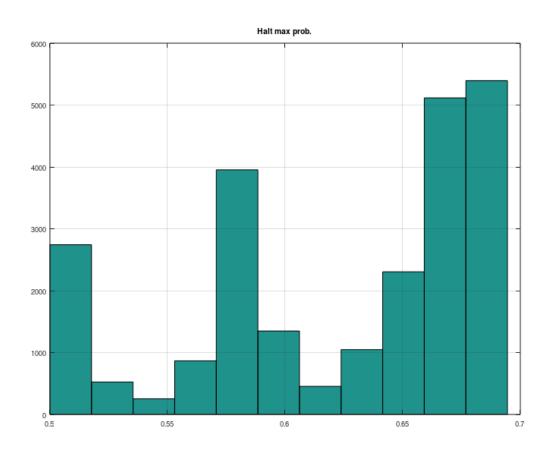
#### Halt max prob. notes

[Notes]

#### Halt max prob. chart



## Halt max prob. histogram



# Direction max prob.

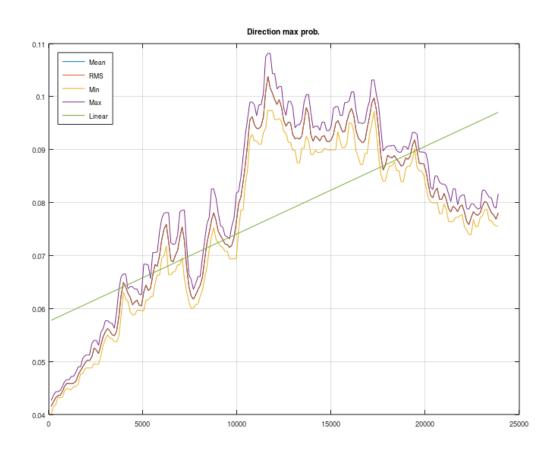
КРІ	
Mean	0.0774
RMS	0.0791
Min	0.04
Median	0.0791
Max	0.108
Trend	Linear
From	0.0576
То	0.0972

0.0431	0.0493	0.0555	0.0617	0.0679	0.0741	0.0803	0.0865	0.0927	0.0989	0.105
1383	1190	1134	2249	1599	2770	3764	2545	4768	2305	293

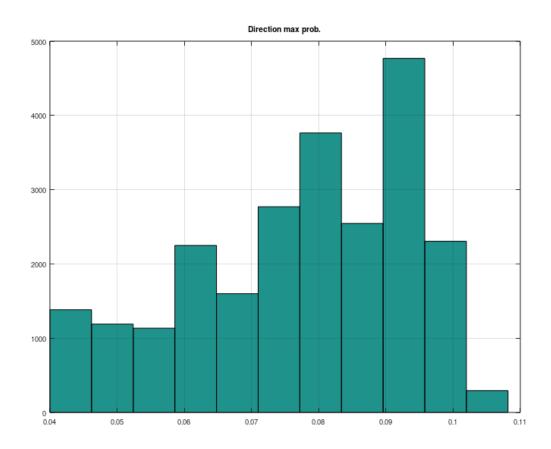
#### Direction max prob. notes

[Notes]

#### Direction max prob. chart



#### Direction max prob. histogram



## Speed max prob.

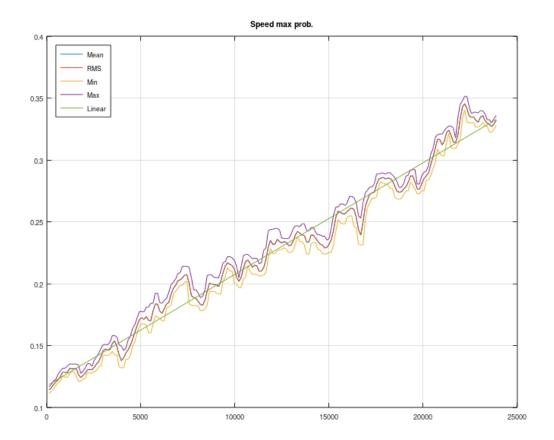
KPI	
Mean	0.226
RMS	0.234
Min	0.111
Median	0.227
Max	0.351
Trend	Linear
From	0.118
То	0.334

0.122	0.144	0.166	0.188	0.209	0.231	0.253	0.275	0.297	0.319	0.34	
2416	2020	1283	2389	3412	3571	1799	2613	1180	1668	1649	

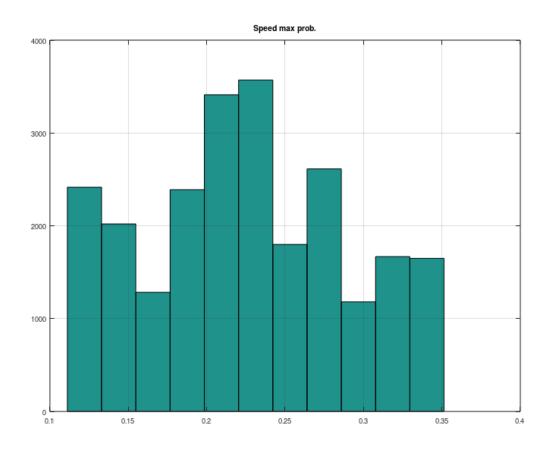
#### Speed max prob. notes

[Notes]

#### Speed max prob. chart



Speed max prob. histogram



## Sensor direction max prob.

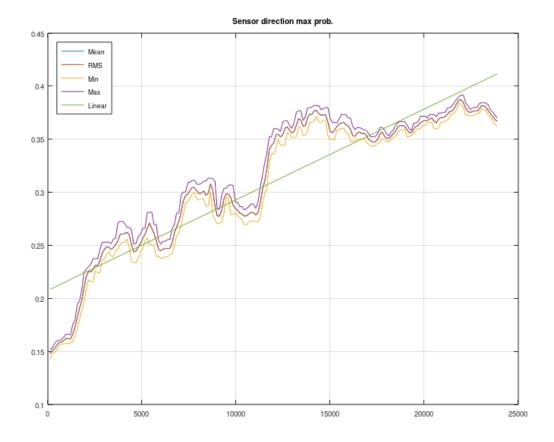
KPI	
Mean	0.31
RMS	0.317
Min	0.143
Median	0.346
Max	0.392
Trend	Linear
From	0.207
То	0.413

0.154	0.177	0.199	0.222	0.245	0.267	0.29	0.313	0.335	0.358	0.38
1316	307	317	738	2697	2291	2844	1116	445	7525	4404

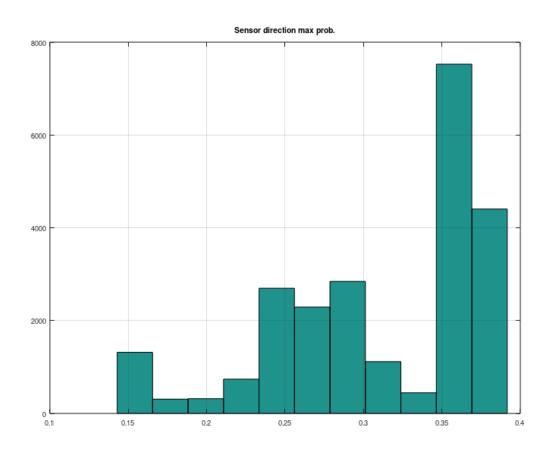
#### Sensor direction max prob. notes

[Notes]

#### Sensor direction max prob. chart



#### Sensor direction max prob. histogram



# Delta halt prob.

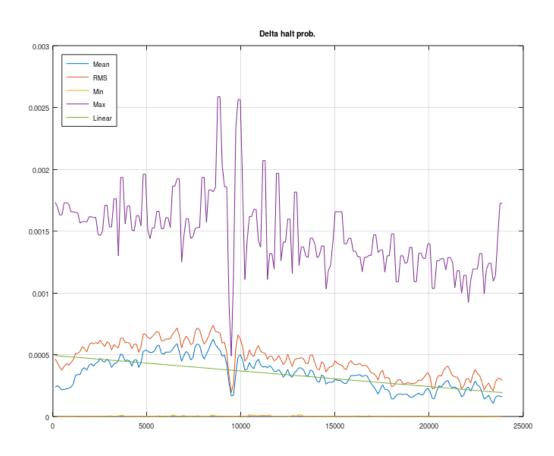
КРІ	
Mean	0.000343
RMS	0.00048
Min	0
Median	0.000227
Max	0.00259
Trend	Linear
From	0.000494
То	0.000191

0.000118	0.000353	0.000588	0.000823	0.00106	0.00129	0.00153	0.00176	0.002	0.00223	0.00247
12249	5212	3091	1697	1016	505	166	45	12	5	2

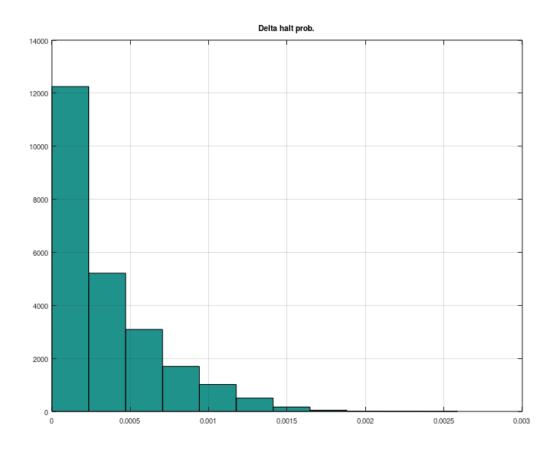
#### Delta halt prob. notes

[Notes]

#### Delta halt prob. chart



#### Delta halt prob. histogram



## Delta direction prob.

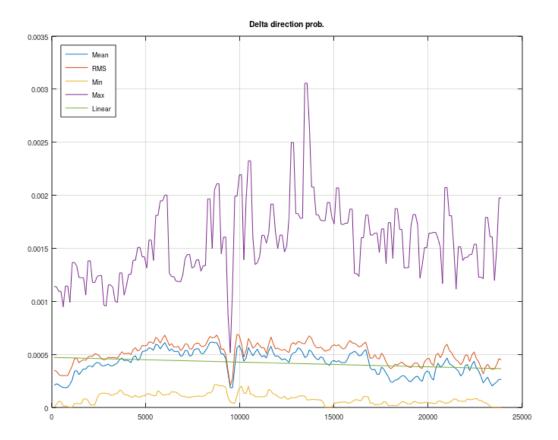
KPI	
Mean	0.000418
RMS	0.000521
Min	9e-08
Median	0.000351
Max	0.00306
Trend	Linear
From	0.000471
То	0.000365

0.000139	0.000417	0.000695	0.000973	0.00125	0.00153	0.00181	0.00208	0.00236	0.00264	0.00292
10302	6242	5092	1742	434	130	41	12	2	2	1

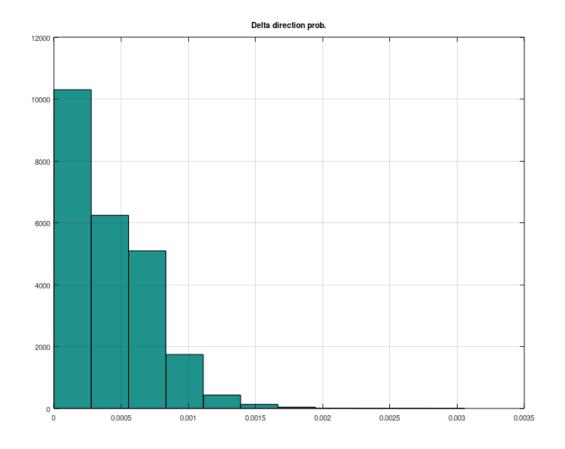
#### Delta direction prob. notes

[Notes]

#### Delta direction prob. chart



Delta direction prob. histogram



## Delta speed prob.

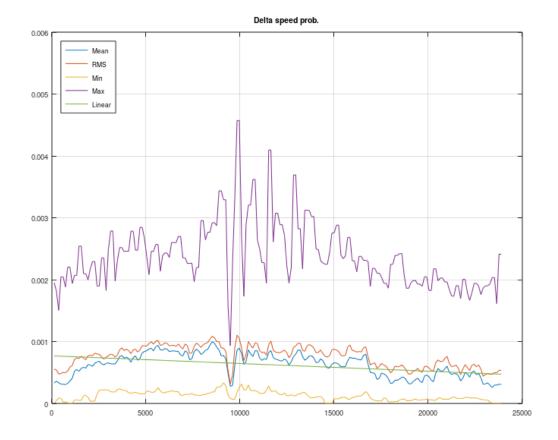
KPI	
Mean	0.00062
RMS	0.00078
Min	2.6e-07
Median	0.000512
Max	0.00457
Trend	Linear
From	0.000769
То	0.000471

0.000208	0.000624	0.00104	0.00146	0.00187	0.00229	0.0027	0.00312	0.00353	0.00395	0.00436
10473	6160	5112	1446	573	161	52	17	4	1	1

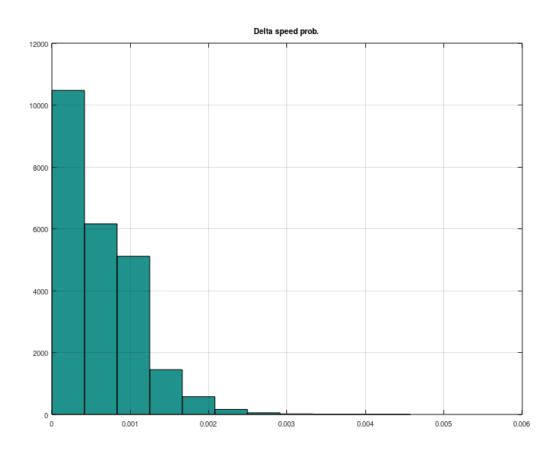
#### Delta speed prob. notes

[Notes]

#### Delta speed prob. chart



## Delta speed prob. histogram



## Delta sensor direction prob.

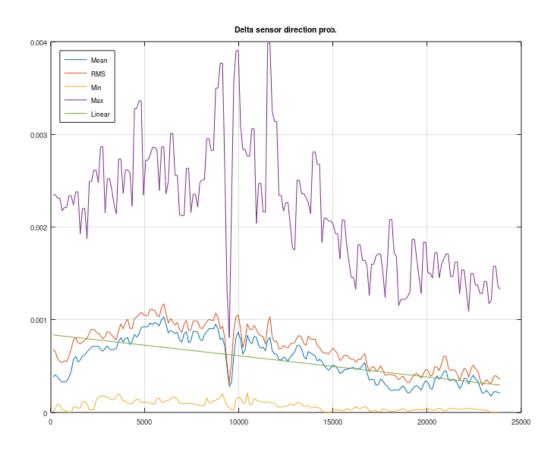
KPI	
Mean	0.000565
RMS	0.00074
Min	2.1e-07
Median	0.000445
Max	0.00398
Trend	Linear
From	0.000839
То	0.000292

0.000181	0.000544	0.000906	0.00127	0.00163	0.00199	0.00235	0.00272	0.00308	0.00344	0.0038
10662	5649	4545	1879	760	306	132	36	18	9	4

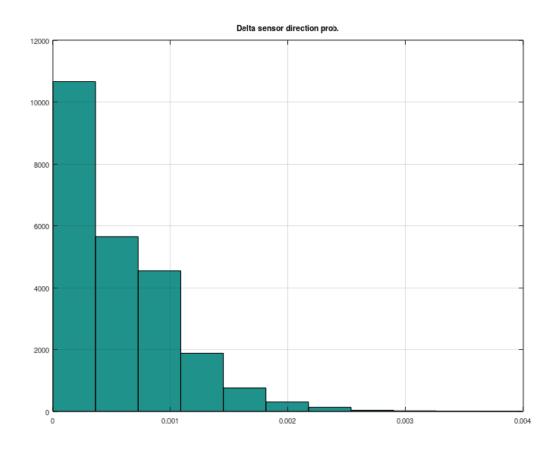
#### Delta sensor direction prob. notes

[Notes]

#### Delta sensor direction prob. chart



#### Delta sensor direction prob. histogram



## Advantage residual estimation (critic)

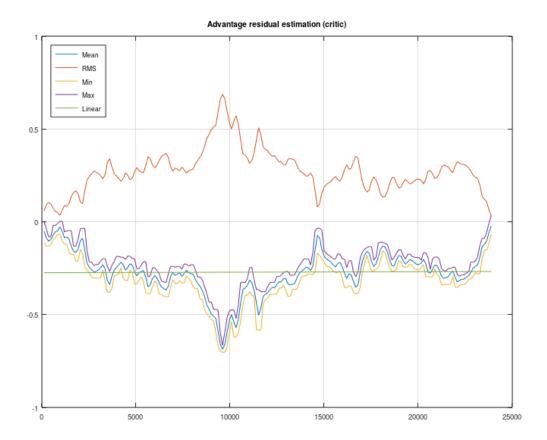
КРІ	
Mean	-0.271
RMS	0.298
Min	-0.703
Median	-0.264
Max	0.0325
Trend	Linear
From	-0.275
То	-0.268

-0.67	-0.603	-0.536	-0.469	-0.402	-0.335	-0.268	-0.202	-0.135	-0.0678	-0.000891	
360	355	680	683	1346	4609	7377	4616	1910	1657	407	

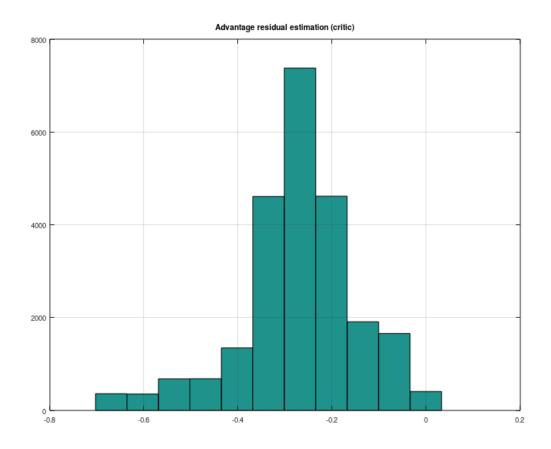
#### Advantage residual estimation (critic) notes

[Notes]

#### Advantage residual estimation (critic) chart



Advantage residual estimation (critic) histogram



# Halt gradient

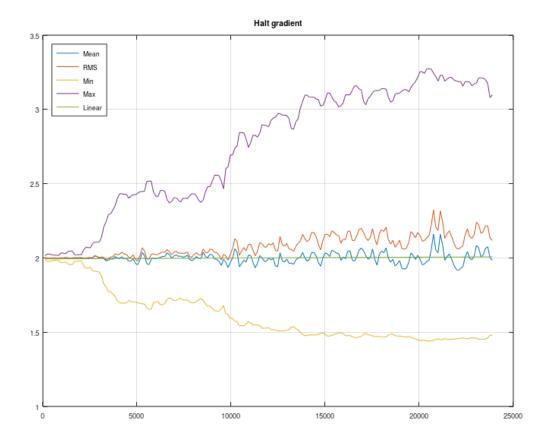
KPI	
Mean	2
RMS	2.08
Min	1.44
Median	1.73
Max	3.27
Trend	Linear
From	1.99
То	2.01

1.52	1.69	1.86	2.02	2.19	2.36	2.52	2.69	2.86	3.02	3.19	
9301	3696	596	2944	188	2095	516	392	862	1861	1549	

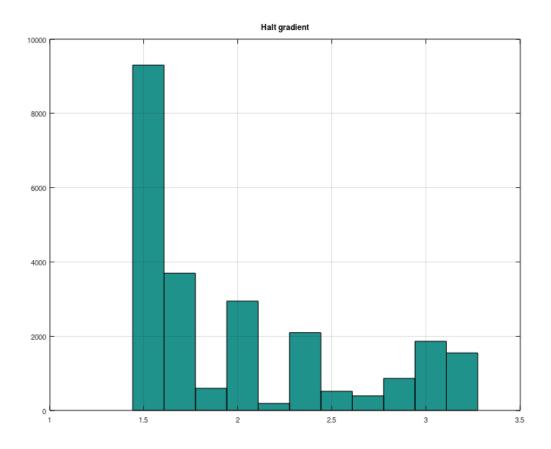
#### Halt gradient notes

[Notes]

#### Halt gradient chart



## Halt gradient histogram



# **Direction gradient**

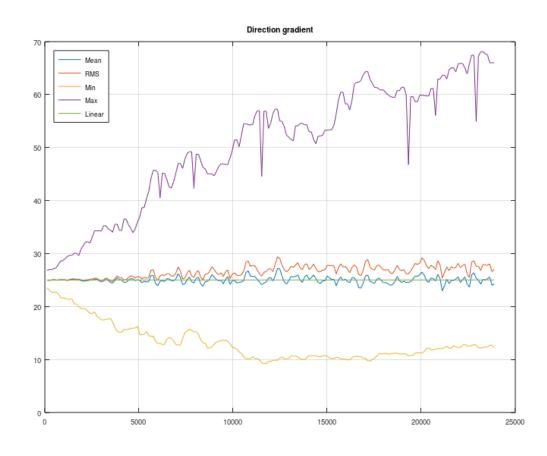
KPI	
Mean	25
RMS	26.6
Min	9.24
Median	24
Max	68.1
Trend	Linear
From	25
То	25

11.9	17.3	22.6	28	33.3	38.7	44	49.4	54.7	60.1	65.4
3157	3647	7083	4691	2476	1846	457	357	171	73	42

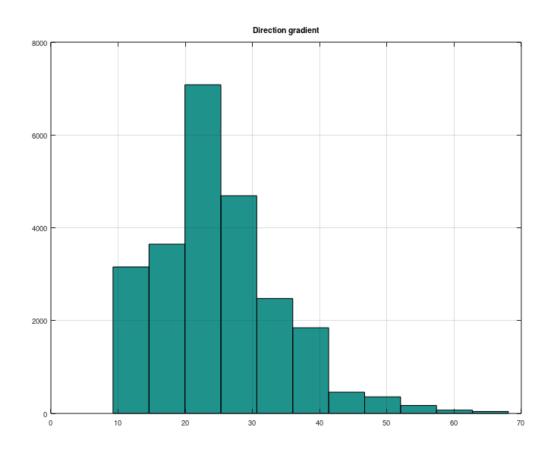
#### **Direction gradient notes**

[Notes]

#### **Direction gradient chart**



#### Direction gradient histogram



## **Speed gradient**

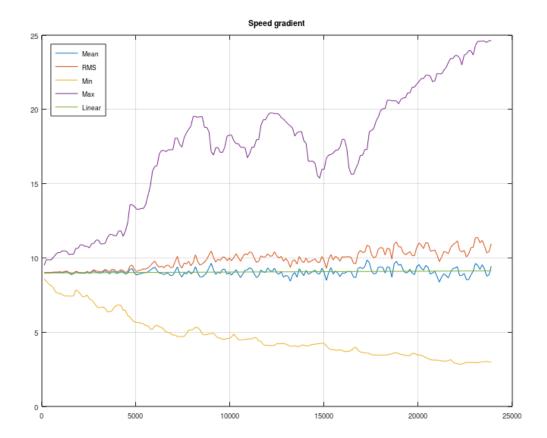
KPI	
Mean	9.06
RMS	9.92
Min	2.85
Median	8.61
Max	24.6
Trend	Linear
From	8.99
То	9.12

3.84	5.82	7.8	9.78	11.8	13.7	15.7	17.7	19.7	21.7	23.6
3829	3326	5459	4802	1867	2415	1212	600	274	103	113

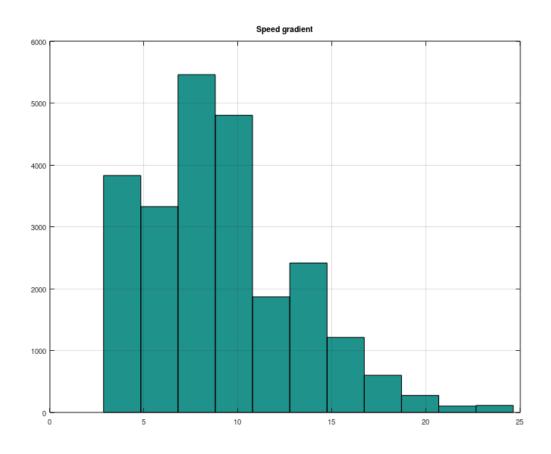
#### **Speed gradient notes**

[Notes]

#### Speed gradient chart



### Speed gradient histogram



## Sensor direction gradient

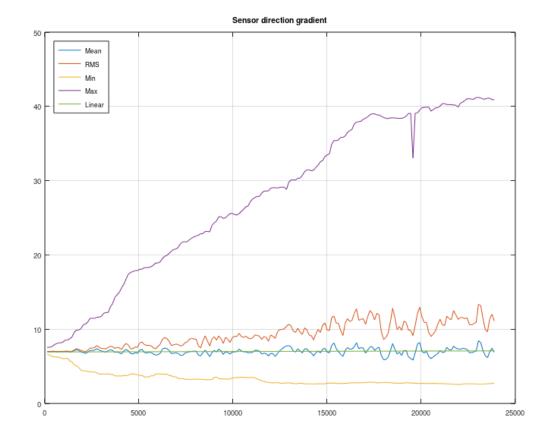
KPI	
Mean	7
RMS	9.47
Min	2.55
Median	4.4
Max	41.2
Trend	Linear
From	6.93
То	7.08

4.31	7.82	11.3	14.9	18.4	21.9	25.4	28.9	32.4	35.9	39.5	
13020	7458	948	647	821	243	187	152	284	41	199	

#### Sensor direction gradient notes

[Notes]

#### Sensor direction gradient chart



#### Sensor direction gradient histogram

