```
function KratkyPlots
```

Kratky plots of SANS data

From T.H. Simm, L. Sun, D.R. Galvin, E.P. Gilbert, D. Alba Venero, Y. Li, T.L. Martin, P.A.J. Bagot, M.P. Moody, P. Hill, H.K.D.H. Bhadeshia, S. Birosca, M.J. Rawson, K.M. Perkins, D.A. Venero, Y. Li, T.L. Martin, P.A.J. Bagot, M.P. Moody, P. Hill, H.K.D.H. Bhadeshia, S. Birosca, M.J. Rawson, K.M. Perkins, A SANS and APT study of precipitate evolution and strengthening in a maraging steel, Mater. Sci. Eng. A. 702 (2017) 414–424. doi:10.1016/j.msea.2017.07.013.__ For Kratky plots see [1] A. Deschamps, F. De Geuser, On the validity of simple precipitate size measurements by small-angle scattering in metallic systems, J. Appl. Crystallogr. 44 (2011) 343–352. doi:10.1107/S0021889811003049.

```
load('qIqdata')
close all
figure
for nn=1:length(q)
    loglog(q{nn},Iq{nn})
    hold on
end
xlabel('q'),ylabel('I(q)')
legend('0 h', '0.5 h', '1 h', '2.5 h', '5 h', '7.5 h', '10 h', '12.5
 h', '24 h')
grid

figure
for nn=1:length(q)
    loglog(q{nn},Iq{nn}.*q{nn}.^2)
    hold on
end
xlabel('q'),ylabel('I.q^2')
legend('0 h', '0.5 h', '1 h', '2.5 h', '5 h', '7.5 h', '10 h', '12.5
 h', '24 h')
grid

figure
I0 = 0.03;
for nn=1:length(q)
    plot(q{nn}.^2, log(Iq{nn}-I0))
    hold on
end
xlabel('q^2'),ylabel('log(I - I_0)')
grid
legend('0 h', '0.5 h', '1 h', '2.5 h', '5 h', '7.5 h', '10 h', '12.5
 h', '24 h')
```

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Warning: Negative data ignored
Warning: Negative data ignored
Warning: Imaginary parts of complex X and/or Y arguments ignored
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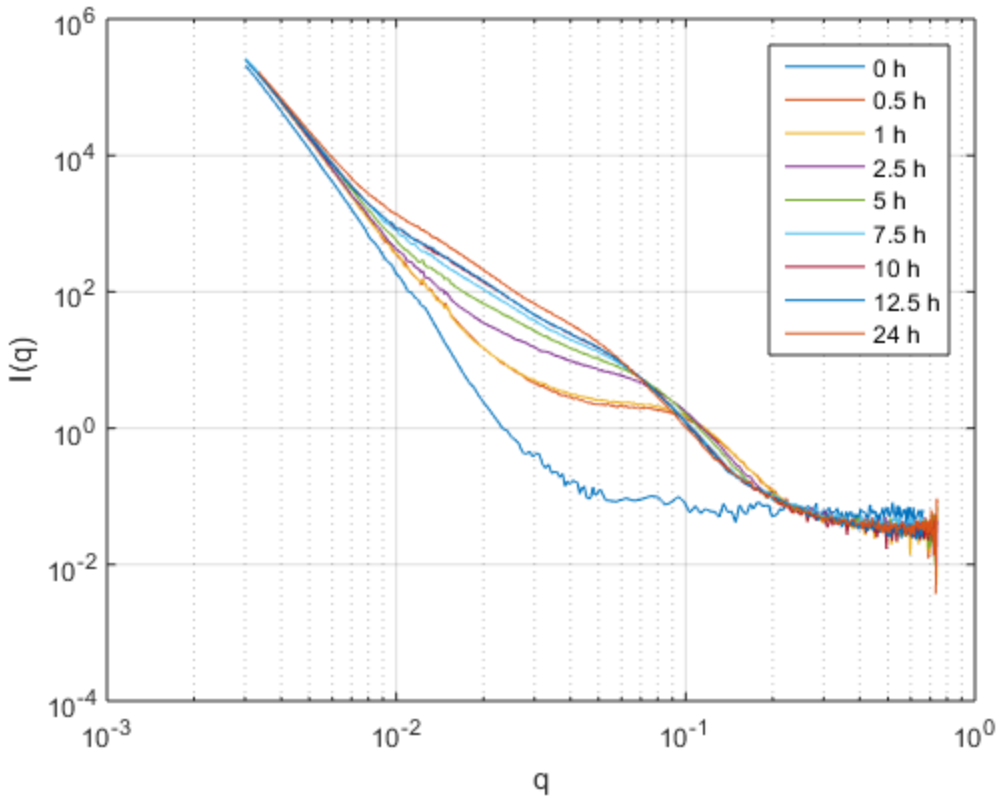
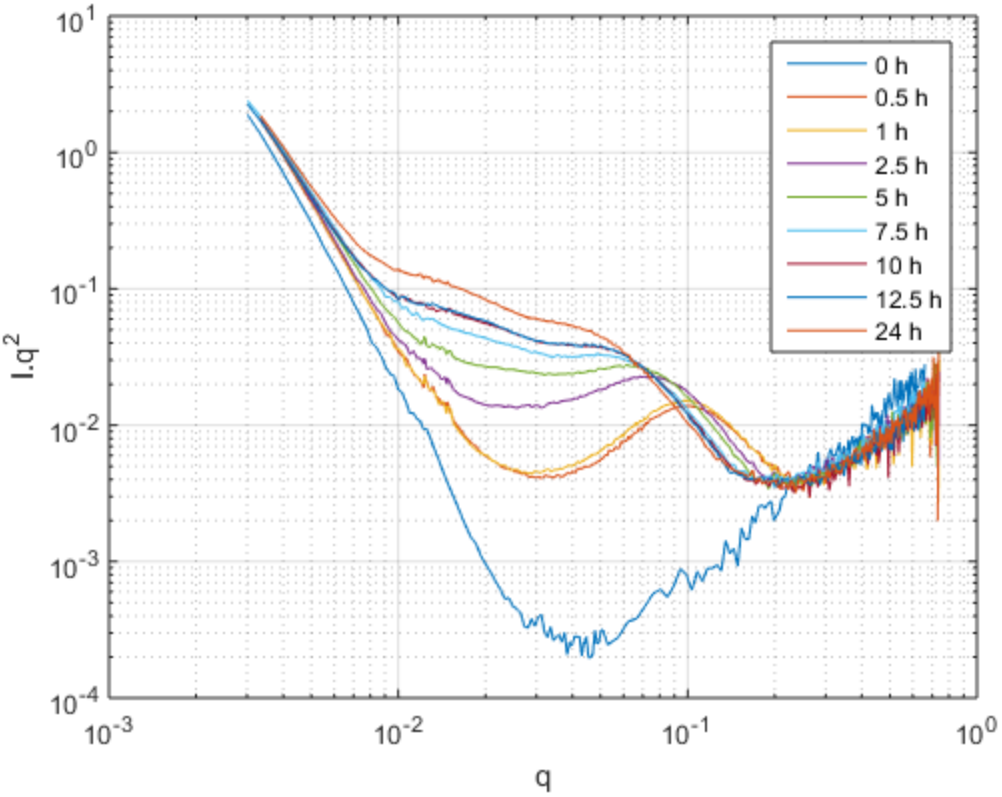
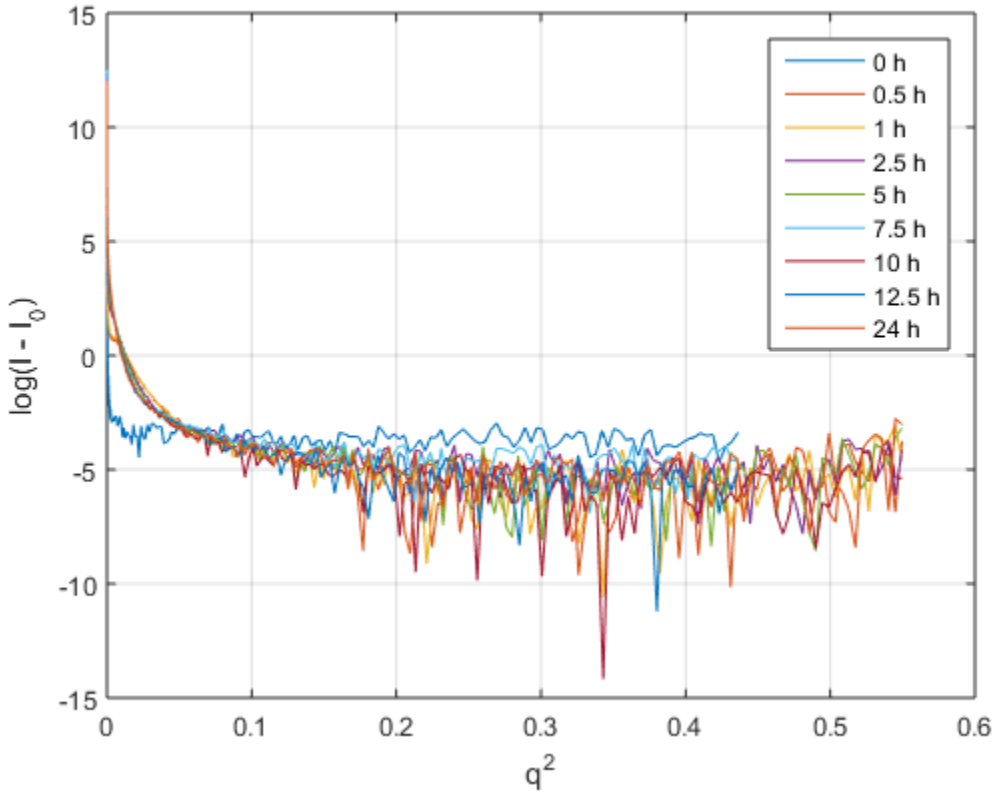



0 h
0.5 h
1 h
2.5 h
5 h
7.5 h
10 h
12.5 h
24 h
I.q^2
q


0 h
0.5 h
1 h
2.5 h
5 h
7.5 h
10 h
12.5 h
24 h
log(I - I0)
q^2

```
end
```

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