Supplementary Material

Matlab code for calculating the area under the type 2 ROC.

```
function auroc2 = type2roc(correct, conf, Nratings)
% function auroc2 = type2roc(correct, conf, Nratings)
%
% Calculate area under type 2 ROC
%
% correct - vector of 1 x ntrials, 0 for error, 1 for correct
% conf - vector of 1 x ntrials of confidence ratings taking values 1:Nratings
% Nratings - how many confidence levels available

i = Nratings+1;
for c = 1:Nratings
        H2(i-1) = length(find(conf == c & correct)) + 0.5;
        FA2(i-1) = length(find(conf == c & ~correct)) + 0.5;
        i = i-1;
end

H2 = H2./sum(H2);
FA2 = FA2./sum(FA2);
cum_H2 = [0 cumsum(H2)];
cum_FA2 = [0 cumsum(FA2)];

i=1;
for c = 1:Nratings
        k(i) = (cum_H2(c+1) - cum_FA2(c))^2 - (cum_H2(c) - cum_FA2(c+1))^2;
        i = i+1;
end
auroc2 = 0.5 + 0.25*sum(k);
```