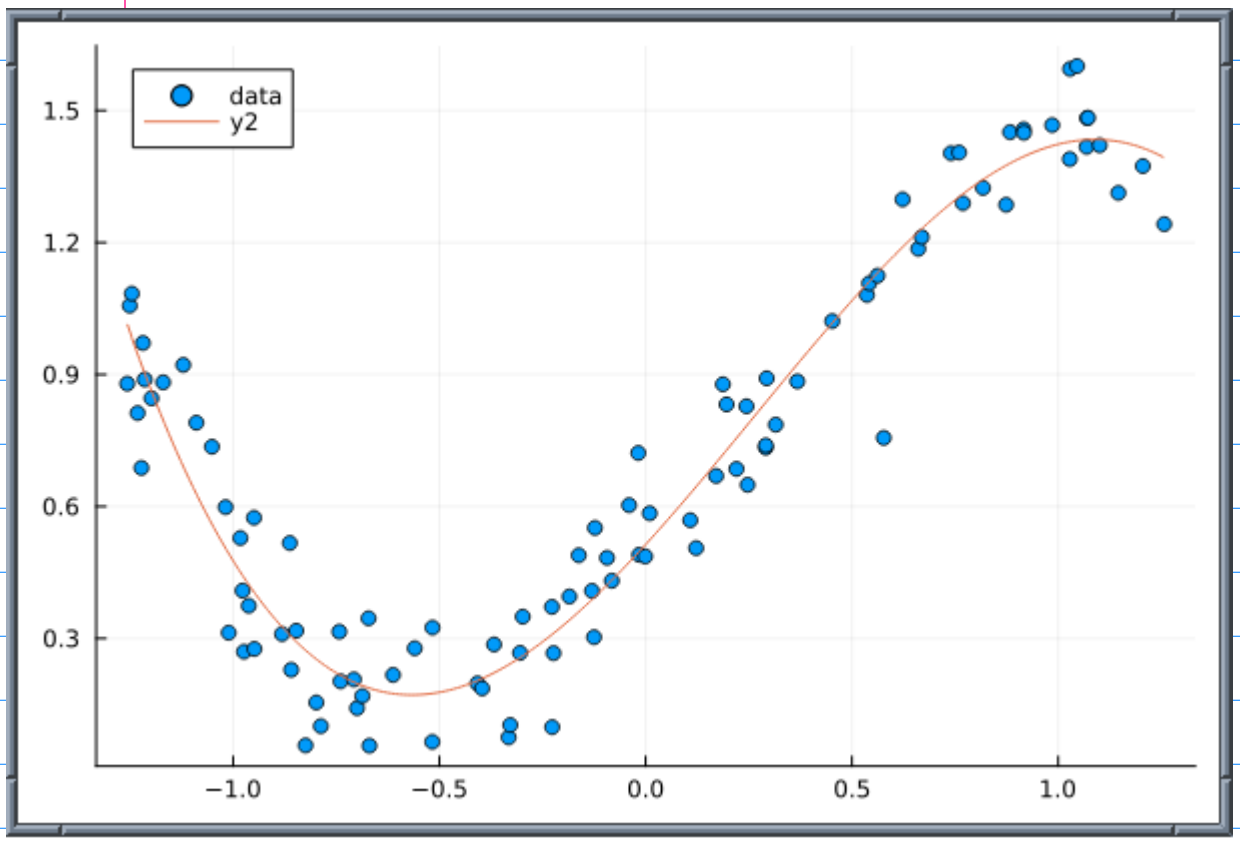
```
julia> sum(cfit[i]*phi[i](1) for i=1:4)
1.4233504503031305

julia> p(x)=sum(cfit[i]*phi[i](x) for i=1:4)
p (generic function with 1 method)

julia> a=minimum(x); b=maximum(x)
1.256986263379

julia> plot!(p,a:0.01:b)
```

Alternative way to create the polynomial. Find define the function and then plot the function.



```
julia> ctrue=[0.51,0.99,0.44,-0.55]
4-element Vector{Float64}:
  0.51
  0.99
  0.44
 -0.55

julia> ptrue(x)=sum(ctrue[i]*phi[i](x) for i=1:4)
ptrue (generic function with 1 method)

julia> plot!(ptrue,a:0.01:b)
```

The data was generated by adding noise to the polynomial with coefficients ctrue.

