Test.wl

1 Test formula and plot

Test formula and plot.

1.1 Test formula

In[•]:=
```
sol1 = DSolve[{∂t y[x, t] + 2 ∂x y[x, t] == Sin[x], y[0, t] == Cos[t]}, y[x, t], {x, t}]
```

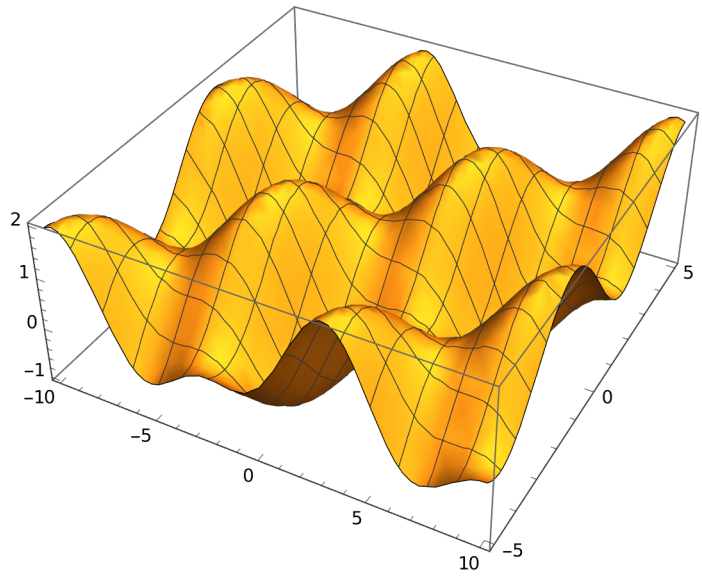
$$\left\{\left\{y[x,\ t] \to \frac{1}{2}\left(1 + 2\ \text{Cos}\left[t - \frac{x}{2}\right] - \text{Cos}[x]\right)\right\}\right\}$$

In[•]:=
```
sol2 = sol1[[1, 1, 2]]
```

$$\frac{1}{2}\left(1 + 2\ \text{Cos}\left[t - \frac{x}{2}\right] - \text{Cos}[x]\right)$$

1.2 Test plot

In[•]:=
```
Plot3D[sol2, {x, -10, 10}, {t, -5, 5}]
```



2 Test manipulate

Test manipulate.

In[•]:= `Manipulate[Plot[Sin[n x], {x, 0, 2 π}], {n, 1, 20}]`