

DIAGRAM REVISTED

```
newtype Diagram =
```

```
    Diagram (Dual [Prim], Envelope, Trace)
```

```
    deriving (Semigroup, Monoid)
```

HELPER FUNCTIONS

```
unD (Diagram (Dual ps, _, _)) = ps
```

```
prim p = Diagram (Dual [p], envelopeP p, traceP p)
```

```
mkD = hom prim
```

```
envelope (Diagram (_, e, _)) = e
```

```
trace (Diagram (_, _, t)) = t
```

TRANSFORMATIONS & MONOID ACTIONS
