

Hello Mirek,

This is good news. Thanks for your efforts!
U++ MT is really improved over time.

My initial impression: It looks and works good.

Here's another example (a visually more pleasing, and more concrete one I hope)
This is to give some basic idea about it's possible usage to our fellow U++ users and newcomers.

```
void Mandelbrot::DrawFractal(const Rectf& r, int ix, int wcount)
{
    // This method draws the famous Mandelbrot fractal, using the escape time algorithm (slow).
    // Important note: Imagebuffer is accessed without using any locking mechsansim.
    // While it is OK here, do not do this in real life unless you know what you're doing!

    auto sz = GetSize();
    Vector<Rect> regions;
    Sizef scale = iscale(sz, Sizef(1.0, 1.0), r.GetSize());

    for(int i = 0, cx = sz.cx / wcount, mod = sz.cx % wcount; i < wcount; i++) {
        auto x = i * cx;
        regions.Add(Rect(x, 0, x + cx + (i == wcount - 1 ? mod : 0), sz.cy));
    }
    ImageBuffer canvas(sz);

    if(CoWork::GetPoolSize() < wcount)
        CoWork::SetPoolSize(wcount);
    CoWork co;
    {
        RTIMING("Mandelbrot calculation with CoWork");
        co * [&] {
            int j = 0;
            while((j = co.Next()) < regions.GetCount()) {
                const auto& rr = regions[j];
                for(auto y = rr.top; y < rr.bottom; y++) {
                    RGBA *pixel = canvas[y];
                    for(auto x = rr.left; x < rr.right; x++) {
                        Complex c(r.left + x / scale.cx, r.top + y / scale.cy);
                        auto z = c;
                        auto i = 0;
                        while(abs(z) < 2 && i < ix) {
                            z = z * z + c;
                        }
                    }
                }
                j++;
            }
        };
    }
}
```

```
    i++;  
  }  
  if(i < ix) {  
    double jj = i + 1 - log(log2(abs(z)));  
    *(pixel + x) = HsvColorf(jj / double(ix), 1.0, (double(ix) / 256.0) * 1.888);  
  }  
  else *(pixel + x) = Black();  
}  
}  
}  
};  
}  
img = canvas;  
Refresh();  
}
```

Best regards,
Oblivion

File Attachments

1) [Mandelbrot.png](#), downloaded 849 times

