Subject: Possible inconsistency with Rect::Contains() right-bottom bounds?
Posted by Oblivion on Sun, 16 Feb 2020 12:06:40 GMT
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Hello,

I've noticed that:

```
template <class T>
bool Rect_<T>::Contains(T x, T y) const {
 return x >= left && x < right && y >= top && y < bottom;
}                        ---                  ---
                          x                    x
template <>
inline bool Rect_<double>::Contains(double x, double y) const {
 return x >= left && x <= right && y >= top && y <= bottom;
}                         ---                   ---
                           ^                     ^

template <class T>
bool Rect_<T>::Contains(const Rect_<T>& r) const {
 return r.left >= left && r.top >= top && r.right <= right && r.bottom <= bottom;
}                                          ---               ---
                                            ^                 ^
```

Best regards,
Obiivion

Subject: Re: Possible inconsistency with Rect::Contains() right-bottom bounds?
Posted by mirek on Sun, 16 Feb 2020 18:04:04 GMT
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Oblivion wrote on Sun, 16 February 2020 13:06Hello,

I've noticed that:

```
template <class T>
bool Rect_<T>::Contains(T x, T y) const {
 return x >= left && x < right && y >= top && y < bottom;
}                        ---                  ---
                          x                    x
template <>
```

```
inline bool Rect_<double>::Contains(double x, double y) const {
 return x >= left && x <= right && y >= top && y <= bottom;
}                          ---                    ---
                            ^                      ^

template <class T>
bool Rect_<T>::Contains(const Rect_<T>& r) const {
 return r.left >= left && r.top >= top && r.right <= right && r.bottom <= bottom;
}                                          ---               ---
                                            ^                 ^
```

Best regards,
Obiivion

Thats intentional. It might be inconsistent, but for doubles it is better to include bottom-right corner into the rectangle.

Mirek

Subject: Re: Possible inconsistency with Rect::Contains() right-bottom bounds?
Posted by Oblivion on Sun, 16 Feb 2020 19:20:26 GMT
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OK, thanks for the clarification.

Best regards,
Oblivion
