

In [32]:

```
import numpy as np
import matplotlib.pyplot as plt
```

In [33]:

```
file = open('fading_factor_test_hp20.npy','rb')
```

In [34]:

```
correct = np.load(file)

correct = correct/8000
```

In [35]:

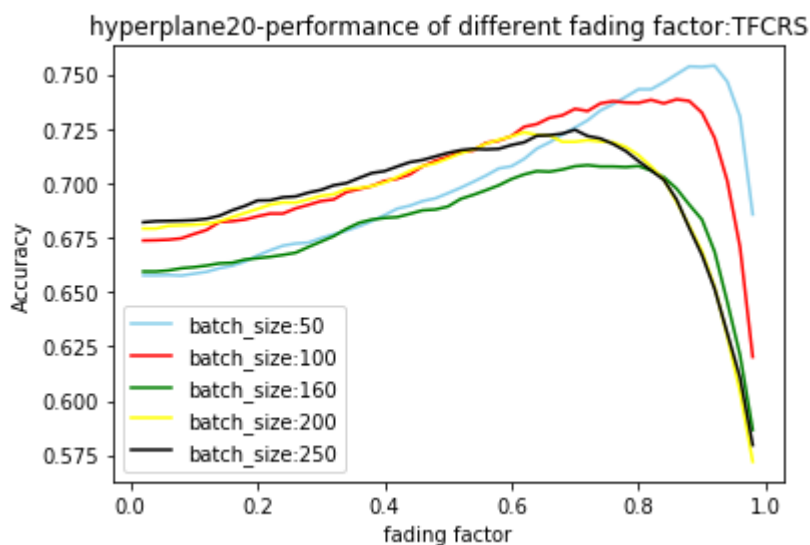
```
correct1 = correct[:, :, 0]

fd = list(range(1,50))

fd = np.array(fd)*0.02
```

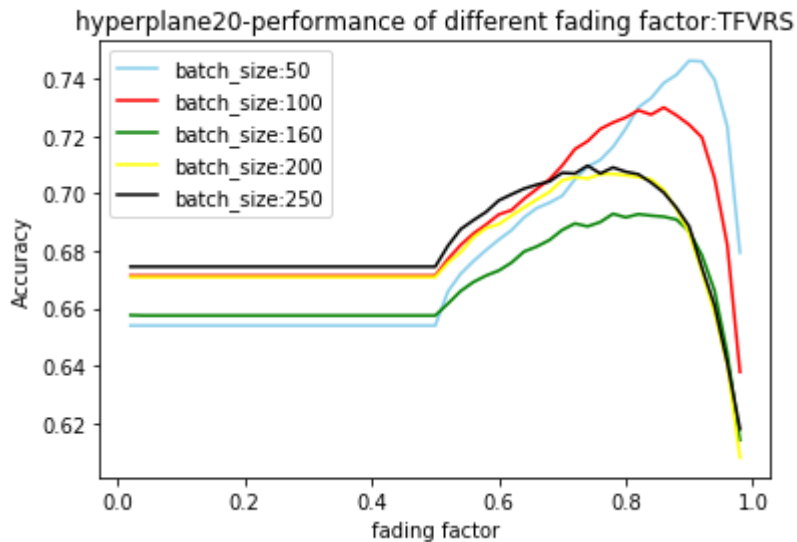
In [36]:

```
plt.plot( fd, correct1[0],color='skyblue', label="batch_size:50")
plt.plot( fd, correct1[1],color='red', label="batch_size:100")
plt.plot( fd, correct1[2],color='green', label="batch_size:160")
plt.plot( fd, correct1[3],color='yellow', label="batch_size:200")
plt.plot( fd, correct1[4],color='black', label="batch_size:250")
plt.legend()
plt.title('hyperplane20-performance of different fading factor:TFCRS')
plt.xlabel("fading factor")
plt.ylabel("Accuracy")
plt.show()
```



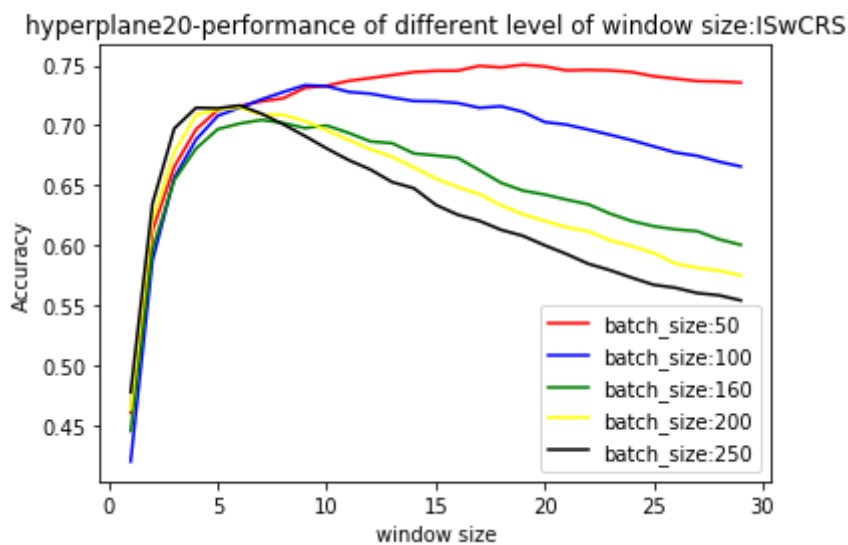
In [37]:

```
correct2 = correct[:, :, 1]
plt.plot( fd, correct2[0], color='skyblue', label="batch_size:50")
plt.plot( fd, correct2[1], color='red', label="batch_size:100")
plt.plot( fd, correct2[2], color='green', label="batch_size:160")
plt.plot( fd, correct2[3], color='yellow', label="batch_size:200")
plt.plot( fd, correct2[4], color='black', label="batch_size:250")
plt.legend()
plt.title('hyperplane20-performance of different fading factor:TFVRS')
plt.xlabel("fading factor")
plt.ylabel("Accuracy")
plt.show()
```



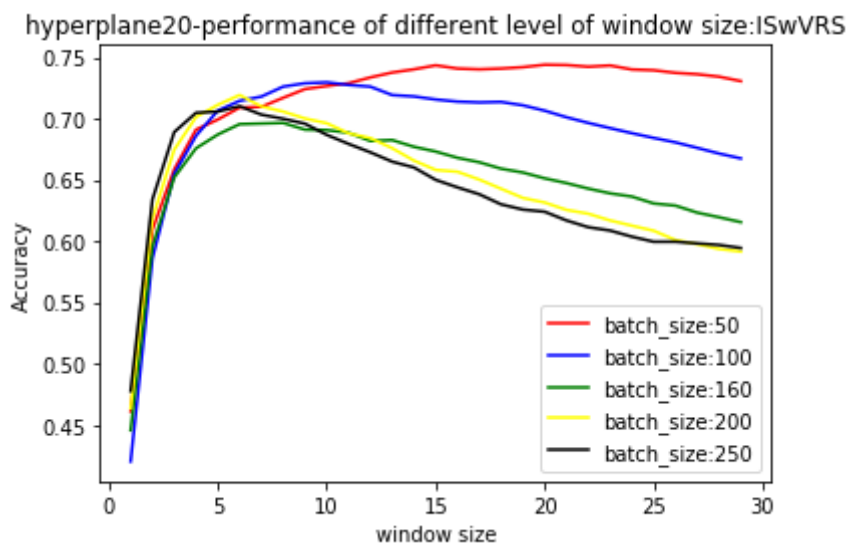
In [49]:

```
file = open('window_size_hp20.npy', 'rb')
correct = np.load(file)
correct = correct/8000
size = list(range(1,30))
correct1 = correct[:, :, 0]
plt.plot(size, correct1[0, :], color='red', label = 'batch_size:50')
plt.plot(size, correct1[1, :], color='blue', label = 'batch_size:100')
plt.plot(size, correct1[2, :], color='green', label = 'batch_size:160')
plt.plot(size, correct1[3, :], color='yellow', label = 'batch_size:200')
plt.plot(size, correct1[4, :], color='black', label = 'batch_size:250')
plt.legend()
plt.title('hyperplane20-performance of different level of window size:ISwCRS')
plt.xlabel("window size")
plt.ylabel("Accuracy")
plt.show()
```



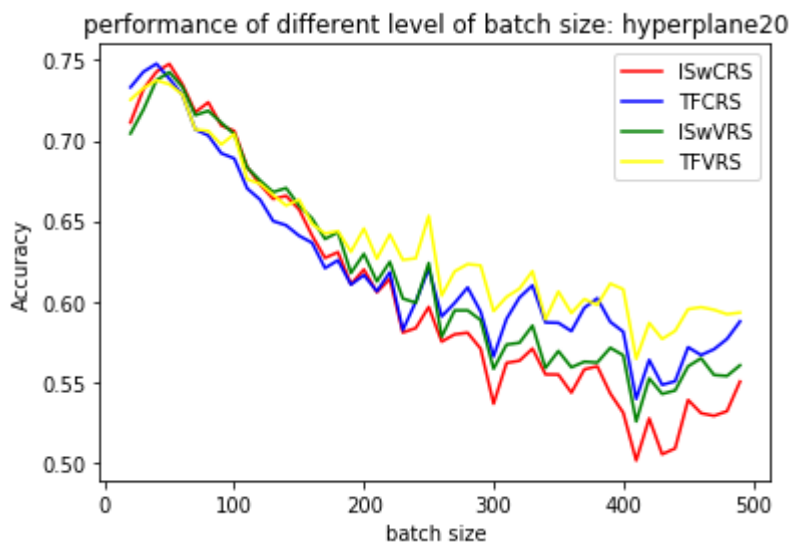
In [50]:

```
file = open('window_size_hp20.npy', 'rb')
correct = np.load(file)
correct = correct/8000
size = list(range(1,30))
correct1 = correct[:, :, 1]
plt.plot(size, correct1[0, :], color='red', label = 'batch_size:50')
plt.plot(size, correct1[1, :], color='blue', label = 'batch_size:100')
plt.plot(size, correct1[2, :], color='green', label = 'batch_size:160')
plt.plot(size, correct1[3, :], color='yellow', label = 'batch_size:200')
plt.plot(size, correct1[4, :], color='black', label = 'batch_size:250')
plt.legend()
plt.title('hyperplane20-performance of different level of window size:ISwVRS')
plt.xlabel("window size")
plt.ylabel("Accuracy")
plt.show()
```



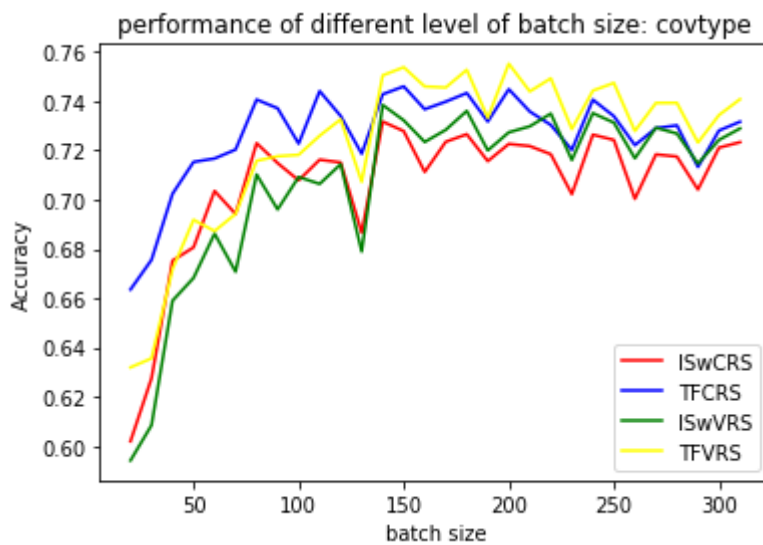
In [38]:

```
file = open('batch_size_hp.npy','rb')
correct = np.load(file)
correct = correct/8000
size = list(range(20,500,10))
plt.plot(size,correct[:,0],color='red',label = 'ISwCRS')
plt.plot(size,correct[:,1],color='blue',label = 'TFCRS')
plt.plot(size,correct[:,2],color='green',label = 'ISwVRS')
plt.plot(size,correct[:,3],color='yellow',label = 'TFVRS')
plt.legend()
plt.title('performance of different level of batch size: hyperplane20')
plt.xlabel("batch size")
plt.ylabel("Accuracy")
plt.show()
```



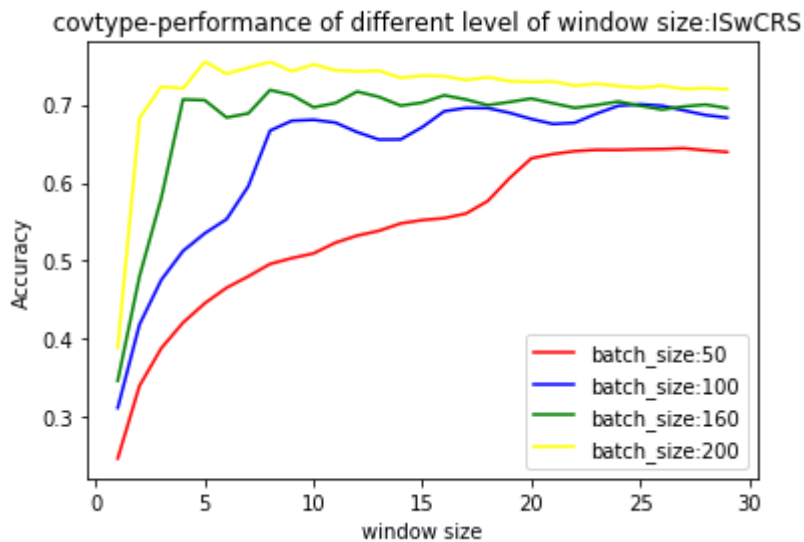
In [45]:

```
file = open('batch_size_cov.npy', 'rb')
correct = np.load(file)
correct = correct/48000
size = list(range(20,320,10))
plt.plot(size,correct[:,0],color='red',label = 'ISwCRS')
plt.plot(size,correct[:,1],color='blue',label = 'TFCRS')
plt.plot(size,correct[:,2],color='green',label = 'ISwVRS')
plt.plot(size,correct[:,3],color='yellow',label = 'TFVRS')
plt.legend()
plt.title('performance of different level of batch size: covtype')
plt.xlabel("batch size")
plt.ylabel("Accuracy")
plt.show()
```



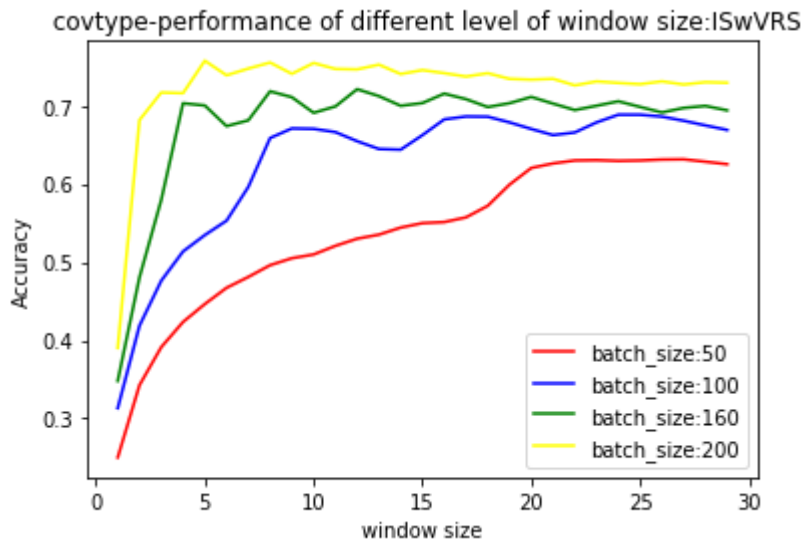
In [42]:

```
file = open('window_size_cov.npy', 'rb')
correct = np.load(file)
correct = correct/48000
size = list(range(1,30))
correct1 = correct[:, :, 0]
plt.plot(size, correct1[0, :], color='red', label = 'batch_size:50')
plt.plot(size, correct1[1, :], color='blue', label = 'batch_size:100')
plt.plot(size, correct1[2, :], color='green', label = 'batch_size:160')
plt.plot(size, correct1[3, :], color='yellow', label = 'batch_size:200')
plt.legend()
plt.title(' covtype-performance of different level of window size:ISwCRS')
plt.xlabel("window size")
plt.ylabel("Accuracy")
plt.show()
```



In [43]:

```
correct2 = correct[:, :, 1]
plt.plot(size, correct2[0, :], color='red', label = 'batch_size:50')
plt.plot(size, correct2[1, :], color='blue', label = 'batch_size:100')
plt.plot(size, correct2[2, :], color='green', label = 'batch_size:160')
plt.plot(size, correct2[3, :], color='yellow', label = 'batch_size:200')
plt.legend()
plt.title(' covtype-performance of different level of window size:ISwVRS')
plt.xlabel("window size")
plt.ylabel("Accuracy")
plt.show()
```



In [ ]: