

```
import org.openqa.selenium.*;
import org.openqa.selenium.chrome.*;
import org.openqa.selenium.support.ui.*;
import java.time.LocalDate;
import java.time.format.DateTimeFormatter;
import java.time.temporal.ChronoUnit;
import java.util.List;
import java.util.regex.*;

public class NebulaTest {
    public static void main(String[] args) {
        String searchKey = System.getProperty("search", "paracetamol");

        ChromeOptions options = new ChromeOptions();
        options.addArguments("--incognito");
        WebDriver driver = new ChromeDriver(options);
        WebDriverWait wait = new WebDriverWait(driver, 20);

        try {
            driver.get("https://patinformed.wipo.int/");
            handlePopups(driver);

            WebElement searchBox = wait.until(ExpectedConditions.elementToBeClickable(By.id("home-search-input")));
            searchBox.sendKeys(searchKey + Keys.ENTER);

            wait.until(ExpectedConditions.elementToBeClickable(By.cssSelector(".results-table tbody tr")));
            WebElement firstResult = driver.findElement(By.cssSelector(".results-table tbody tr td:nth-child(2)"));
            firstResult.click();
        }
    }
}
```

```
wait.until(ExpectedConditions.presenceOfElementLocated(By.cssSelector(".mat-tab-body-content")));
```

```
List<WebElement> tables = driver.findElements(By.tagName("table"));
```

```
for (WebElement table : tables) {
```

```
    List<WebElement> rows = table.findElements(By.tagName("tr"));
```

```
    String filing = null, publication = null, grant = null;
```

```
    for (WebElement row : rows) {
```

```
        String text = row.getText().toLowerCase();
```

```
        if (text.contains("filing date")) filing = extractDate(row.getText());
```

```
        if (text.contains("publication date")) publication = extractDate(row.getText());
```

```
        if (text.contains("grant date")) grant = extractDate(row.getText());
```

```
    }
```

```
    if (filing != null || publication != null || grant != null) {
```

```
        printDifferences(filing, publication, grant);
```

```
        break;
```

```
    }
```

```
}
```

```
} catch (Exception e) {
```

```
    System.out.println("Error: " + e.getMessage());
```

```
} finally {
```

```
    driver.quit();
```

```
}
```

```
}
```

```
private static void handlePopups(WebDriver driver) {
```

```
    try {
```

```
        WebDriverWait wait = new WebDriverWait(driver, 5);
```

```
        WebElement acceptBtn =  
wait.until(ExpectedConditions.elementToBeClickable(By.cssSelector("button.cookie-consent-  
accept"))));
```

```
        acceptBtn.click();
```

```
    } catch (Exception ignored) {}
```

```
}
```

```
private static String extractDate(String text) {
```

```
    Pattern pattern = Pattern.compile("\\d{4}-\\d{2}-\\d{2}");
```

```
    Matcher matcher = pattern.matcher(text);
```

```
    return matcher.find() ? matcher.group() : null;
```

```
}
```

```
private static void printDifferences(String filing, String publication, String grant) {
```

```
    DateTimeFormatter fmt = DateTimeFormatter.ofPattern("yyyy-MM-dd");
```

```
    if (publication != null) System.out.println("Publication date: " + publication);
```

```
    if (grant != null) System.out.println("Grant date: " + grant);
```

```
    if (filing != null) System.out.println("Filing date: " + filing);
```

```
    if (publication != null && grant != null)
```

```
        System.out.println("→ Publication ↔ Grant: " +  
ChronoUnit.DAYS.between(LocalDate.parse(publication, fmt), LocalDate.parse(grant, fmt)) + "  
days");
```

```
    if (publication != null && filing != null)
```

```
        System.out.println("→ Publication ↔ Filing: " +  
ChronoUnit.DAYS.between(LocalDate.parse(publication, fmt), LocalDate.parse(filing, fmt)) + " days");
```

```
    if (grant != null && filing != null)
```

```
        System.out.println("→ Grant ↔ Filing: " + ChronoUnit.DAYS.between(LocalDate.parse(grant,  
fmt), LocalDate.parse(filing, fmt)) + " days");
```

```
    }
```

```
}
```