

Anhang zu:

**Konzept zur Bewertung
des Verkehrsablaufs
an Knotenpunkten
mit und ohne LSA**

von

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Professur für integrierte Verkehrsplanung und Straßentechnik
Technische Universität Dresden

**Berichte der
Bundesanstalt für Straßenwesen**

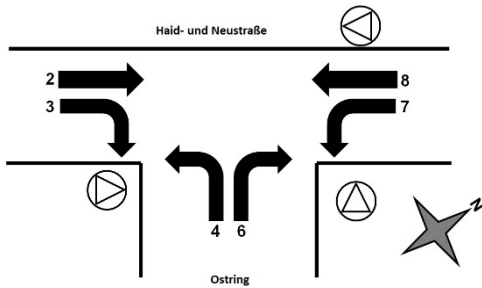
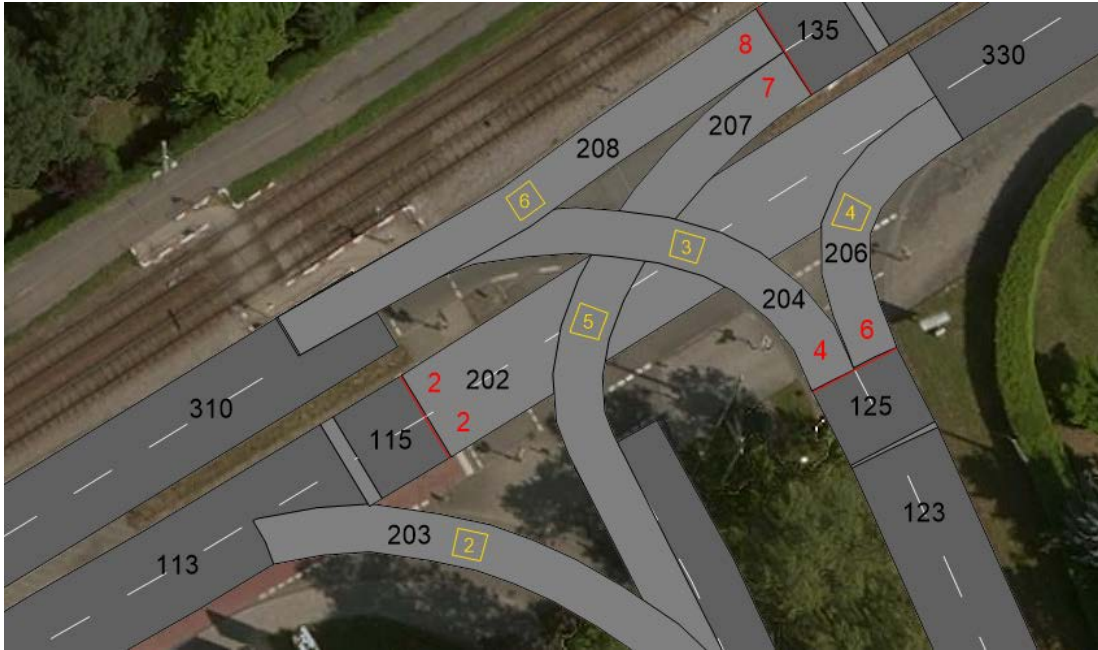
Verkehrstechnik Heft V 324 – Anhang

bast

Anhang I: Knotenpunkte mit Lichtsignalanlage

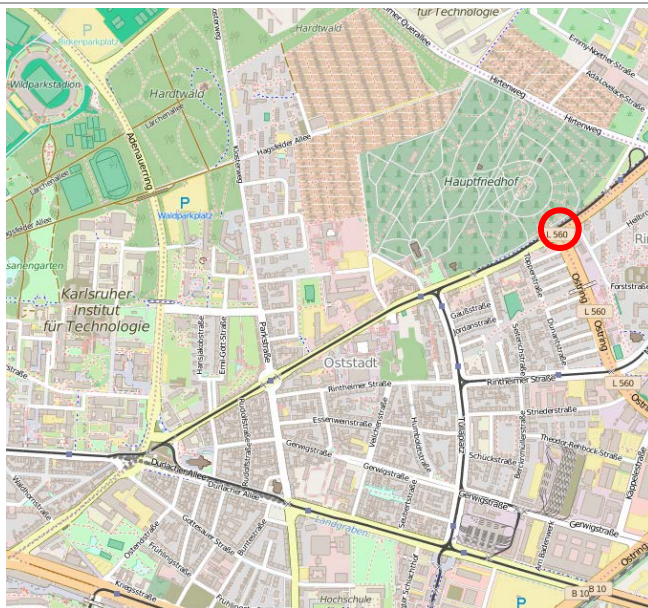
Ostring / Haid-und-Neustraße (Karlsruhe)

Typ:	LSA	Arme:	3	Lage:	innerorts
Erhebungstag:	24.07.2013 (Mi)	Erhebungszeit:	12:00 – 18:00 Uhr		

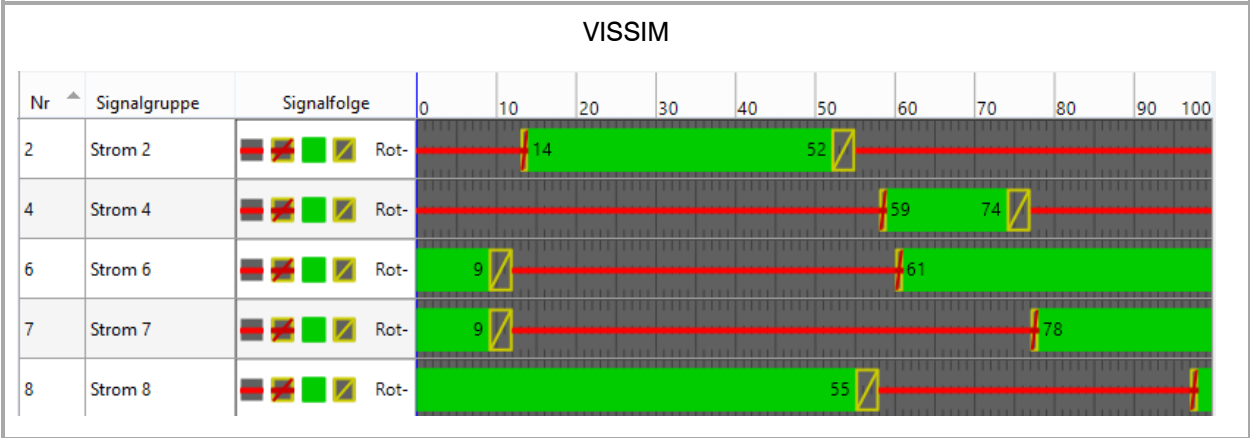
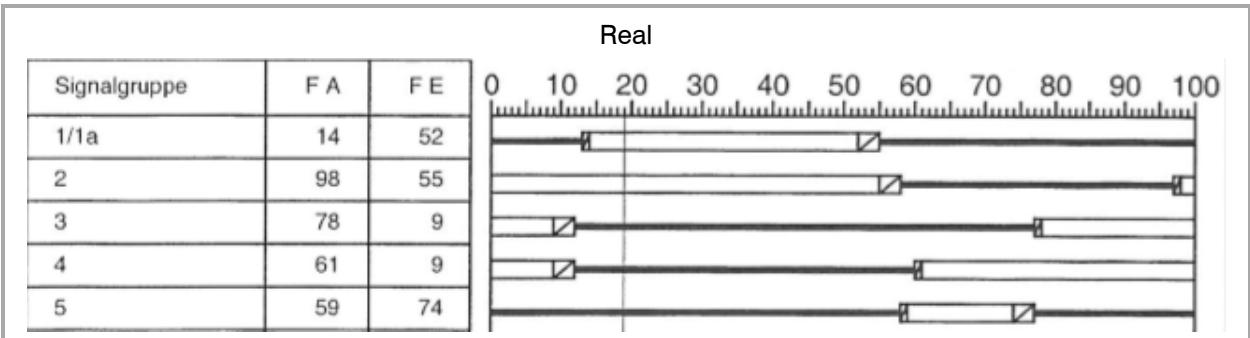


Charakteristik:

- $V_{zul(HR)}$: 50 km/h
- $V_{zul(NR)}$: 50 km/h
- Beginn Auswertung: 16:00 Uhr
- Q_{spitze} : 2074 Fz/h
- Verkehrsknoten
- Mischfahrstreifen in allen Zufahrten
- Linienbusverkehr
- 24-h-Messung mit Seitenradar

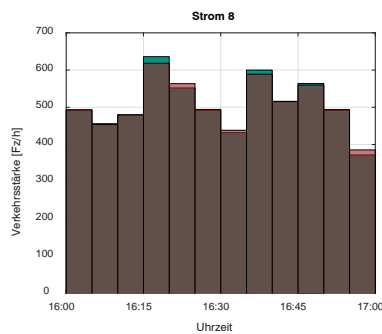
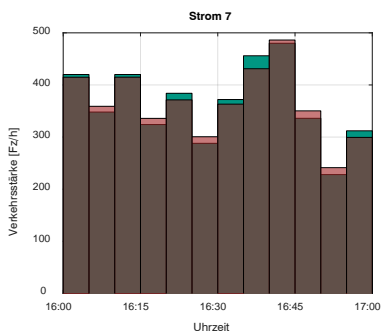
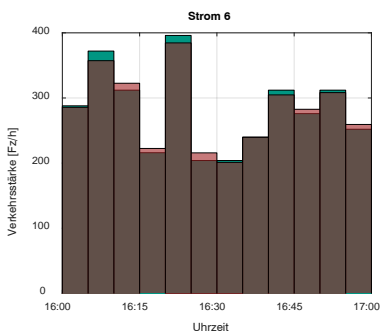
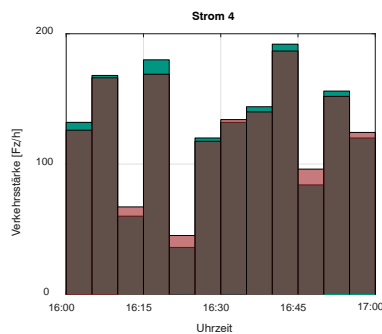
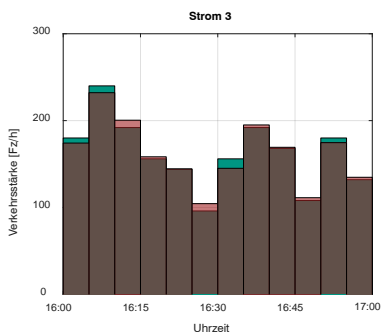
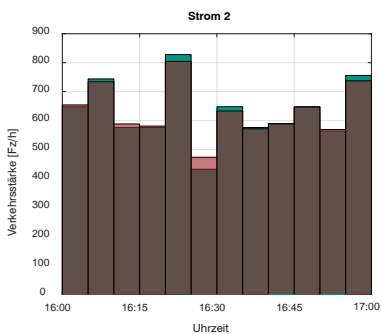


Signalzeitenplan



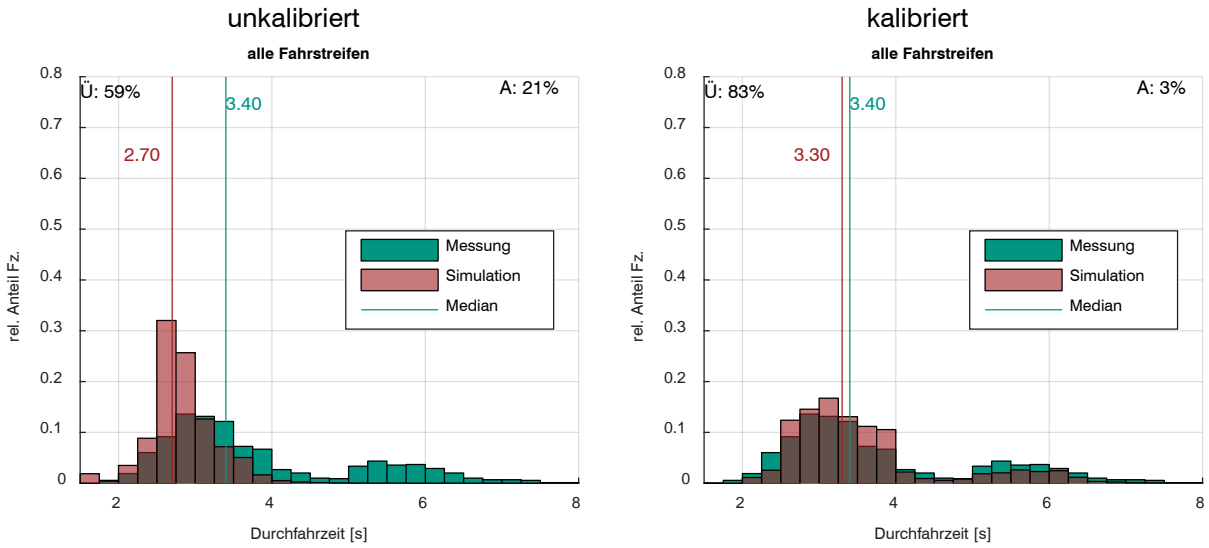
Erhobene Verkehrsstärke

Einzelne Ströme

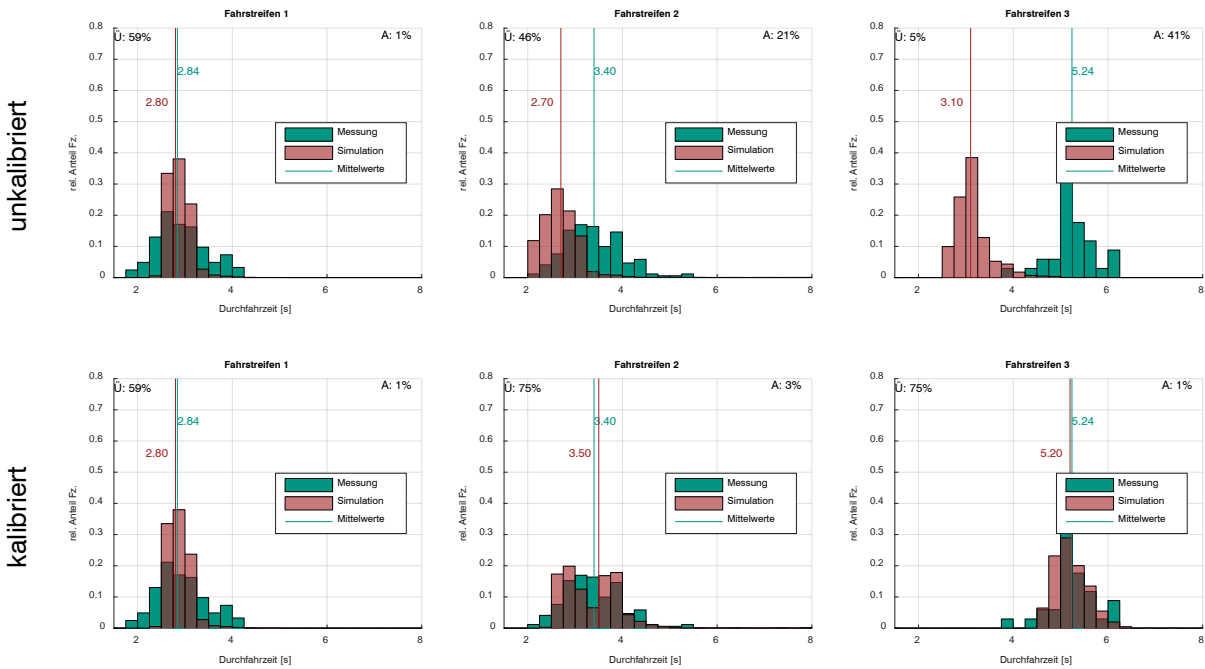


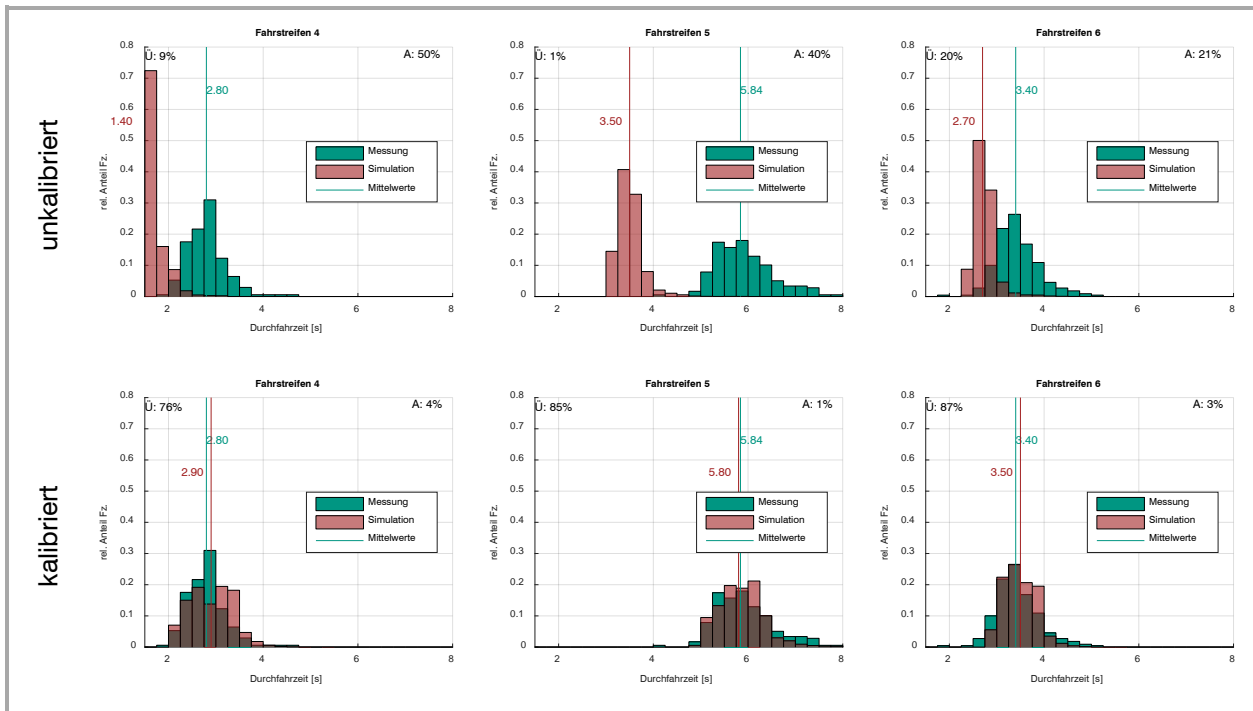
Kalibrierung Durchfahrzeit

Gesamter Knotenpunkt



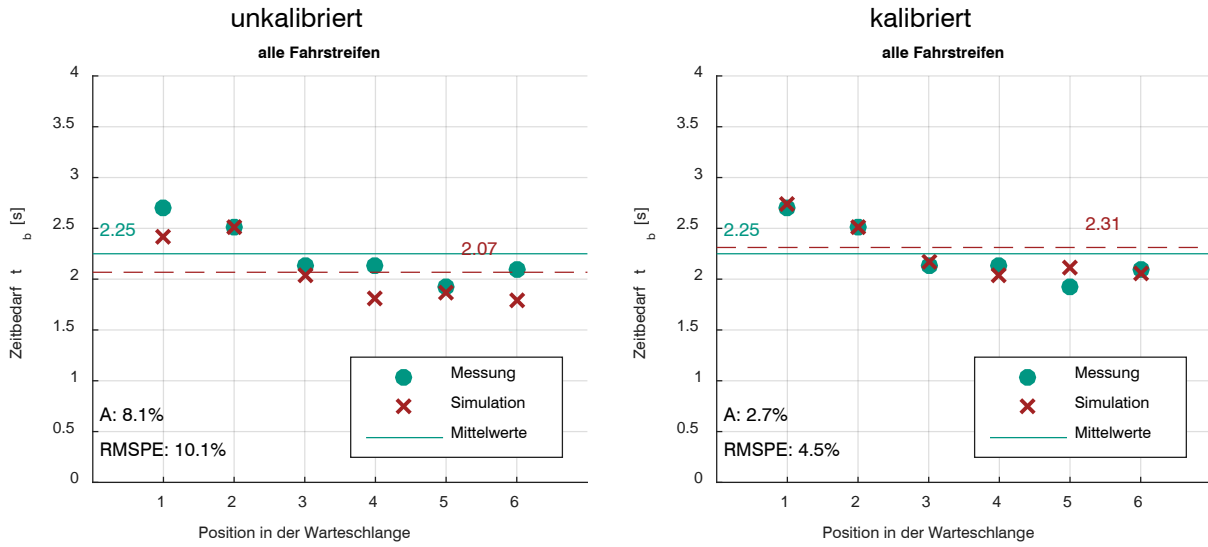
Einzelne Fahrstreifen



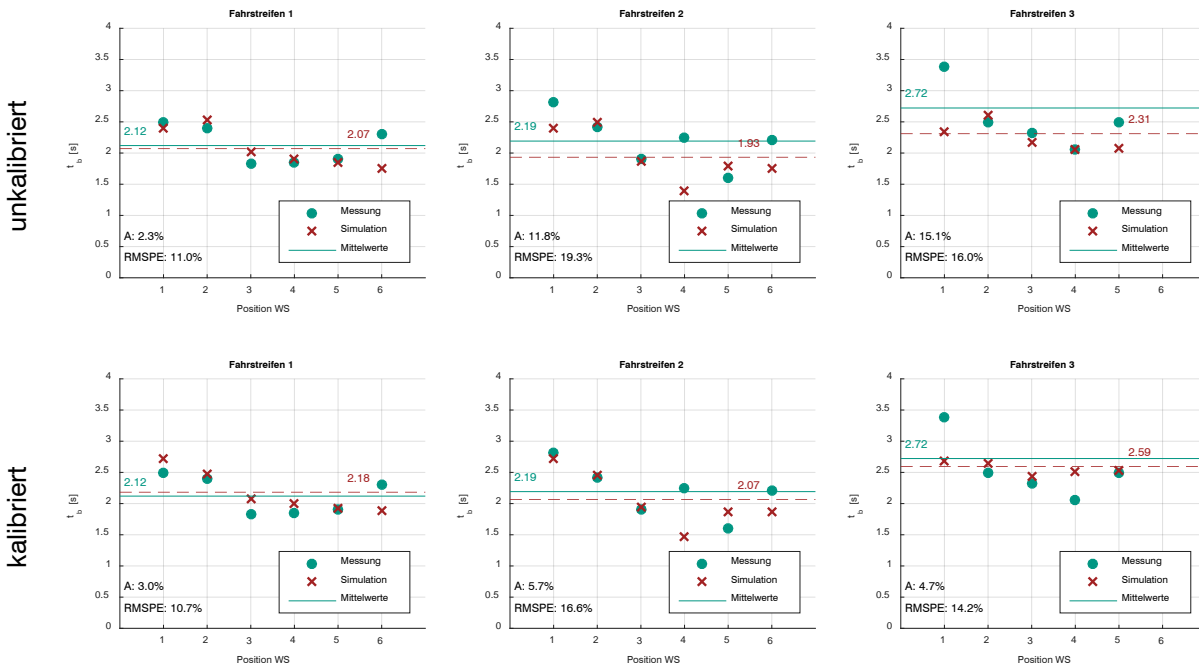


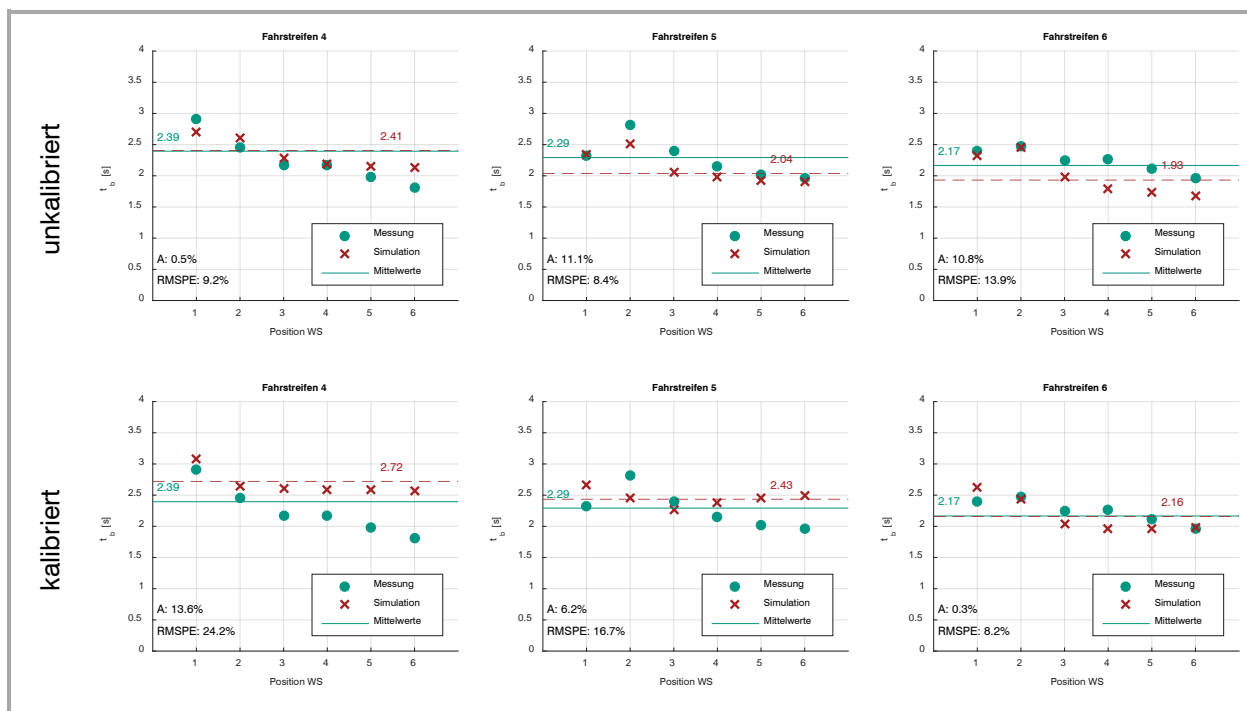
Kalibrierung Zeitbedarfswert

Gesamter Knotenpunkt



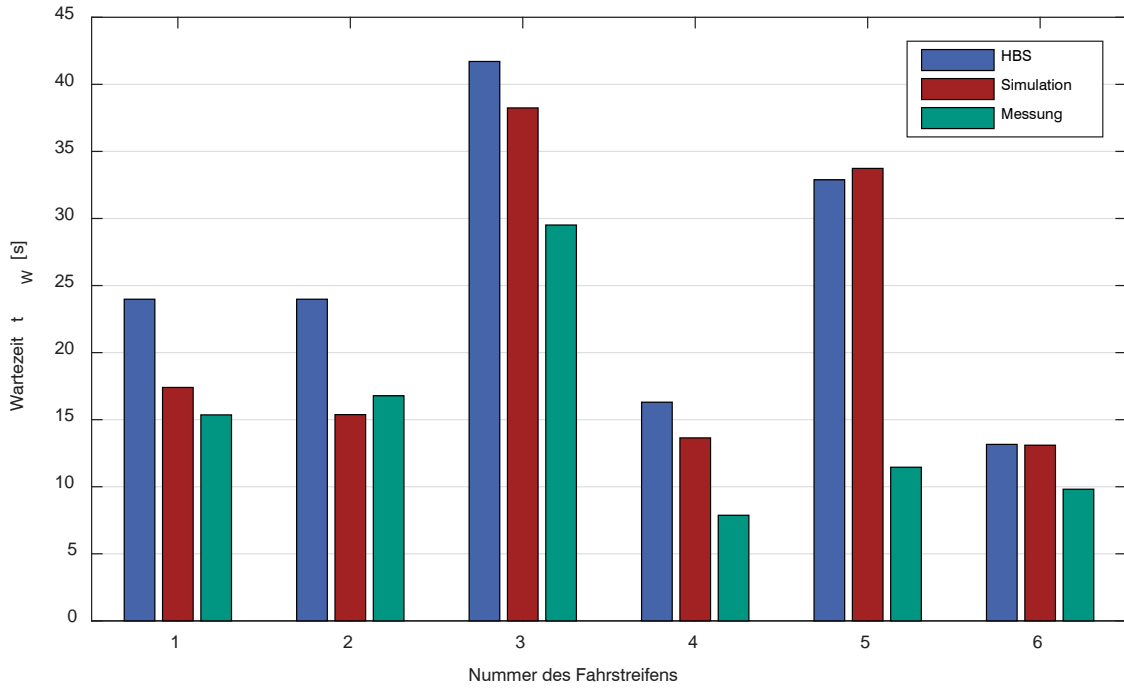
Einzelne Fahrstreifen





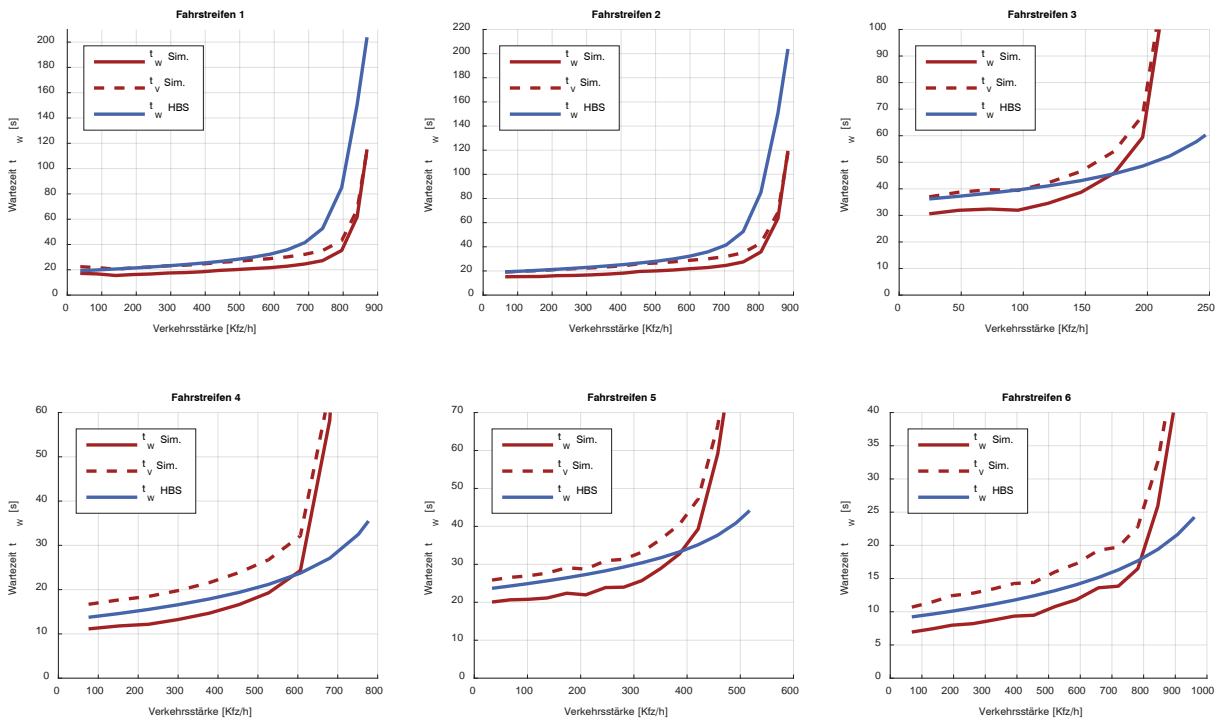
Vergleich der Wartezeiten

Einzelne Fahrstreifen



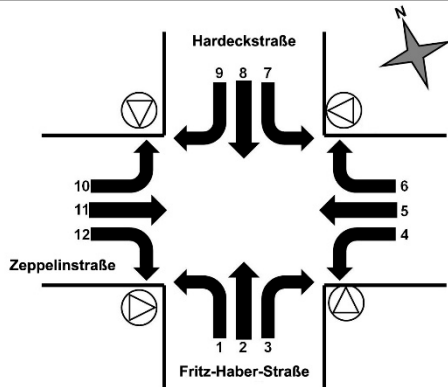
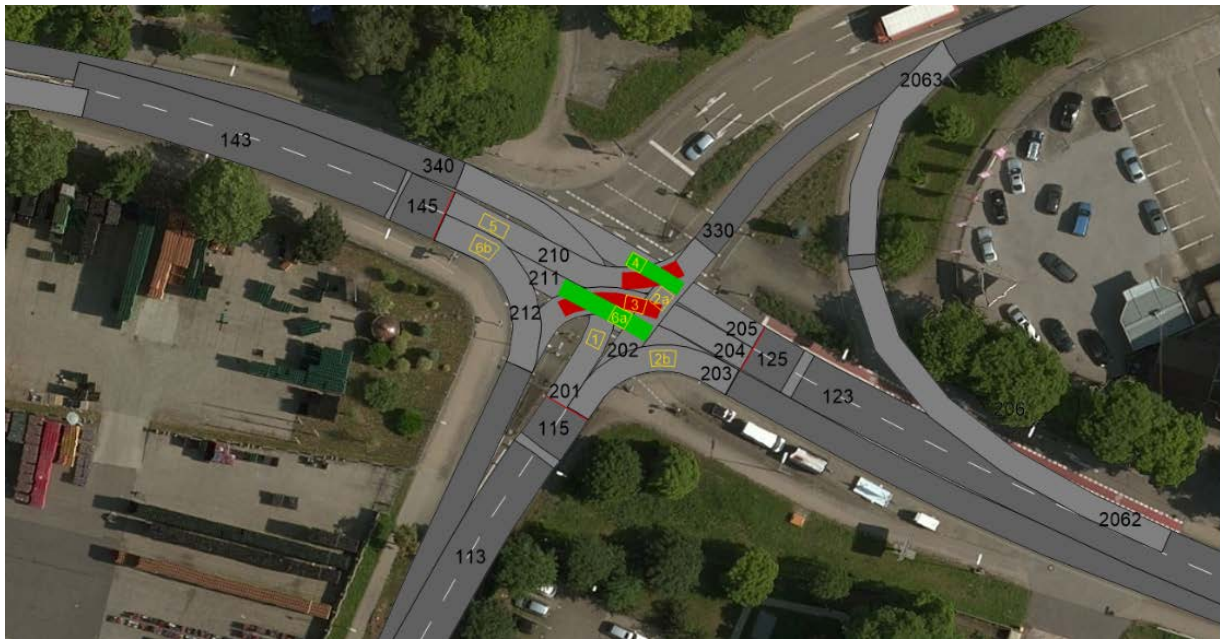
Lastfälle

Einzelne Fahrstreifen



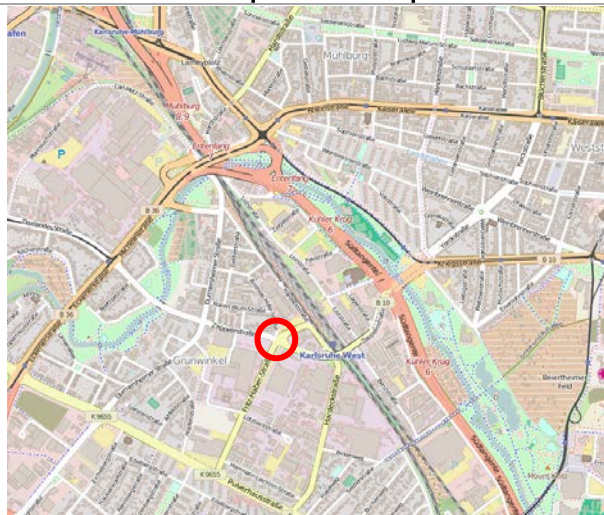
Zeppelinstraße / Fritz-Haber-Straße (Karlsruhe)

Typ:	LSA	Arme:	4	Lage:	innerorts
Erhebungstag:	24.07.2013 (Mi)	Erhebungszeit:	12:00 – 18:00 Uhr		



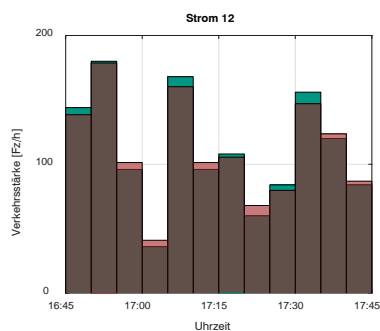
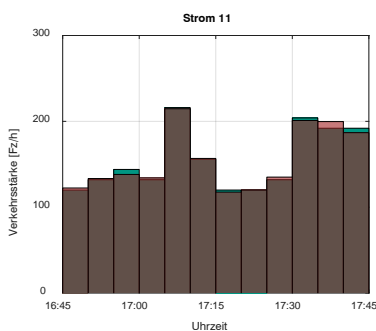
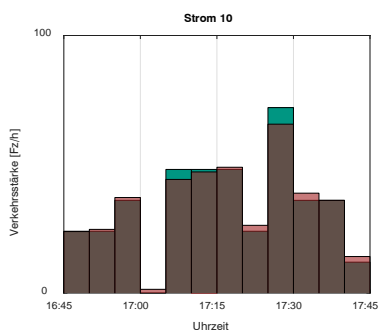
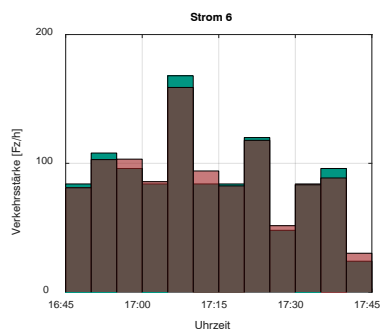
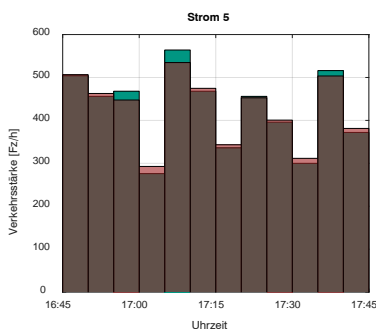
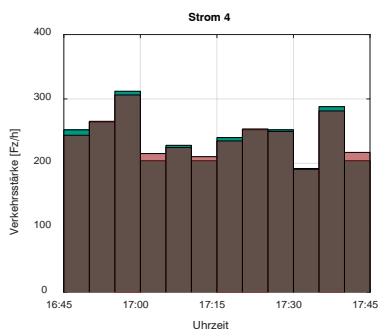
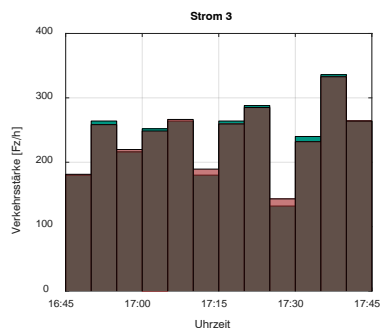
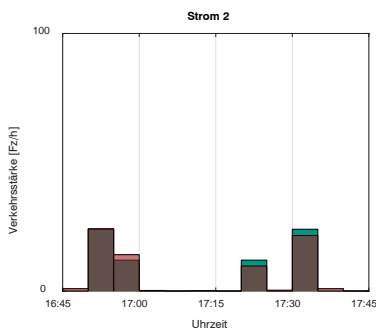
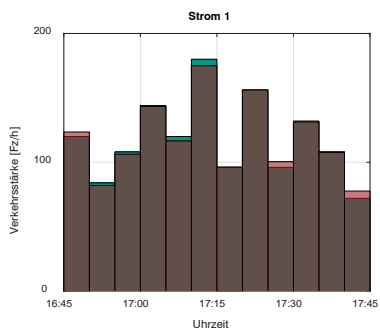
Charakteristik:

- $V_{zul(HR)}$: 50 km/h
- $V_{zul(NR)}$: 50 km/h
- Beginn Auswertung: 16:45 Uhr
- Q_{spitze} : 1421 Fz/h
- Verkehrsknoten
- Mischfahrstreifen in allen Zufahrten
- Linienbusverkehr
- 24-h-Messung mit Seitenradar



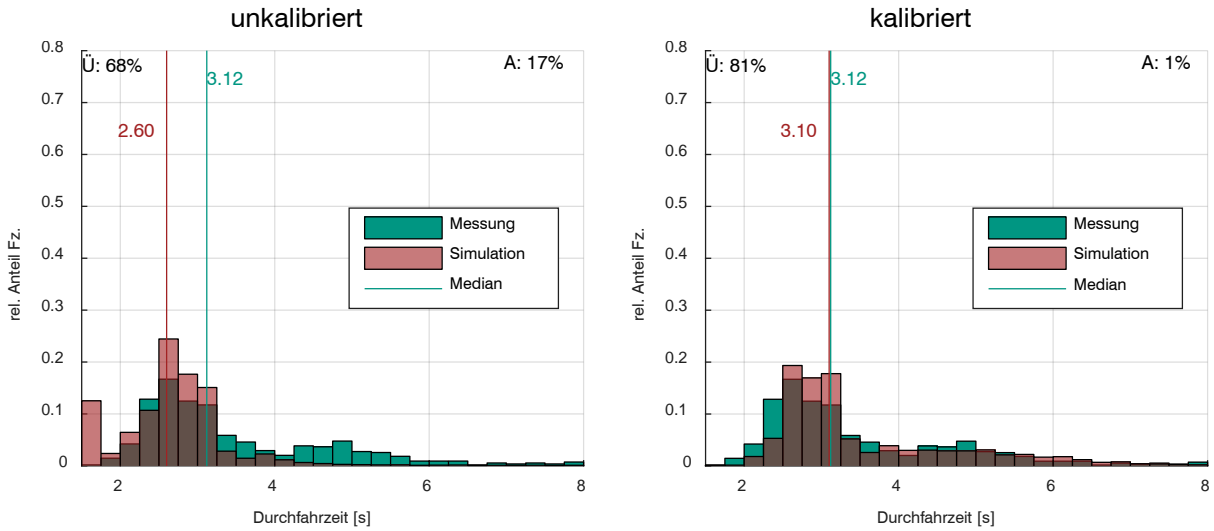
Erhobene Verkehrsstärke

Einzelne Ströme

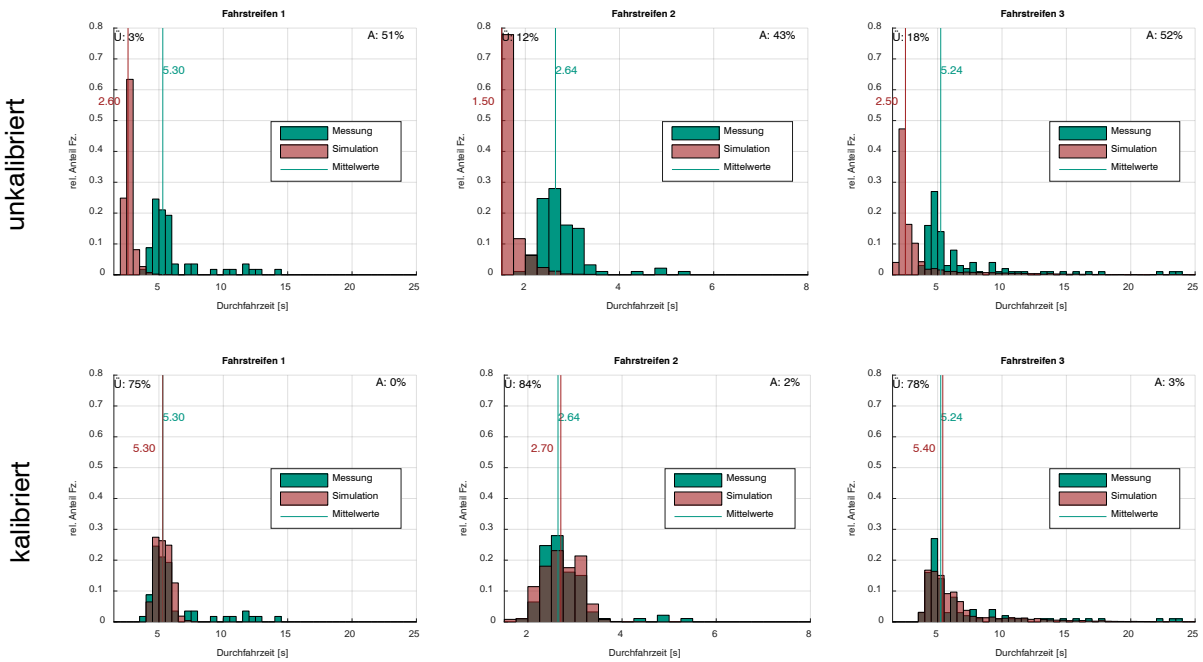


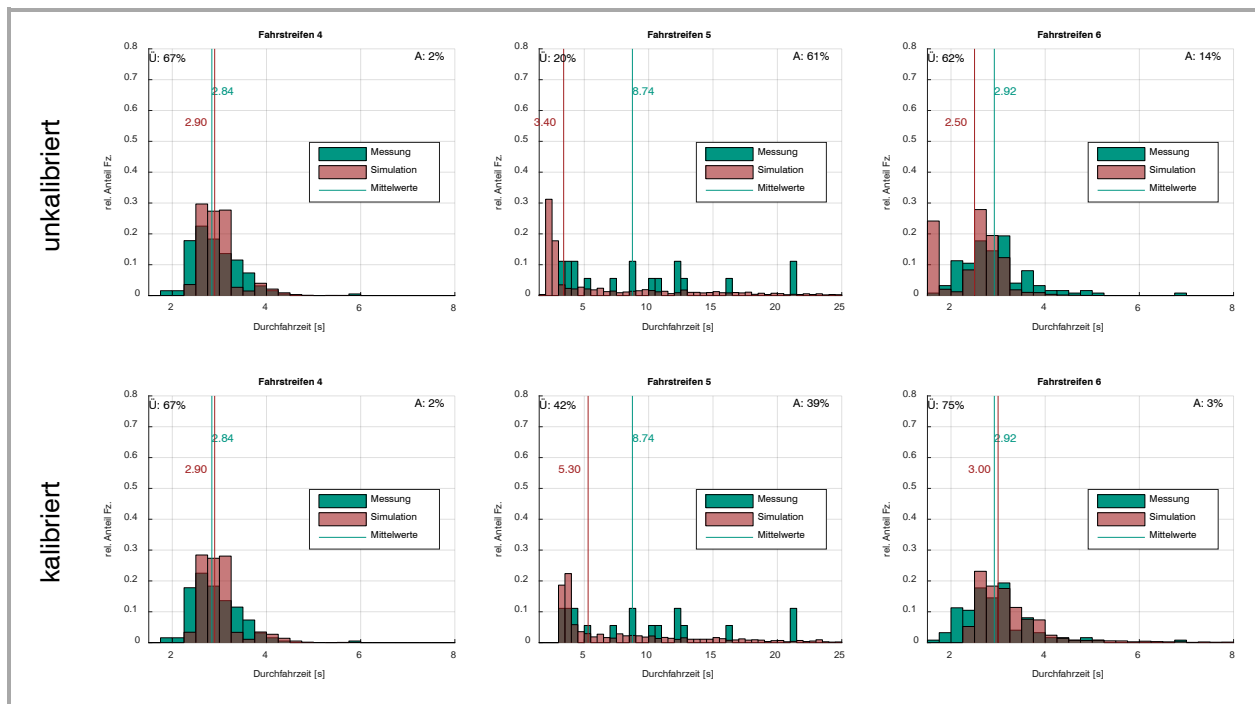
Kalibrierung Durchfahrzeit

Gesamter Knotenpunkt



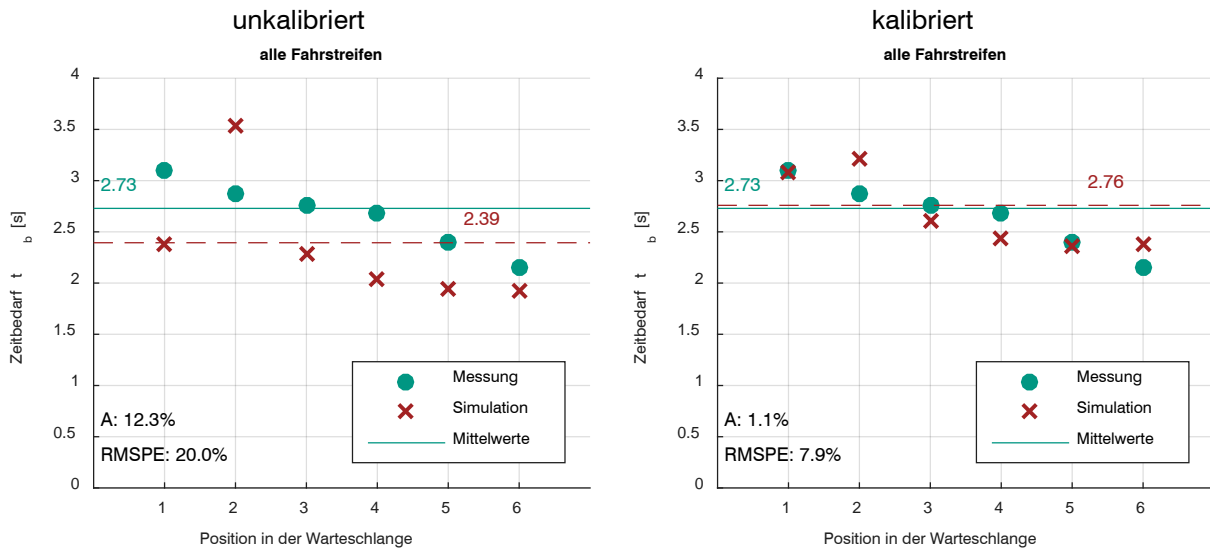
Einzelne Fahrstreifen



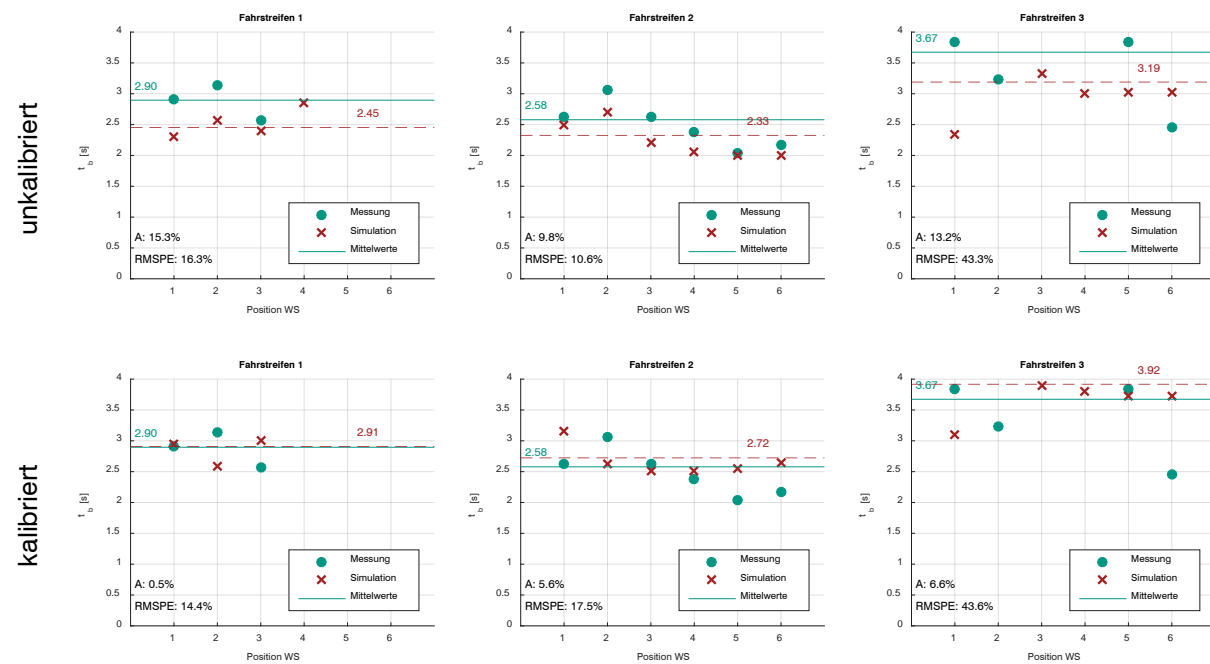


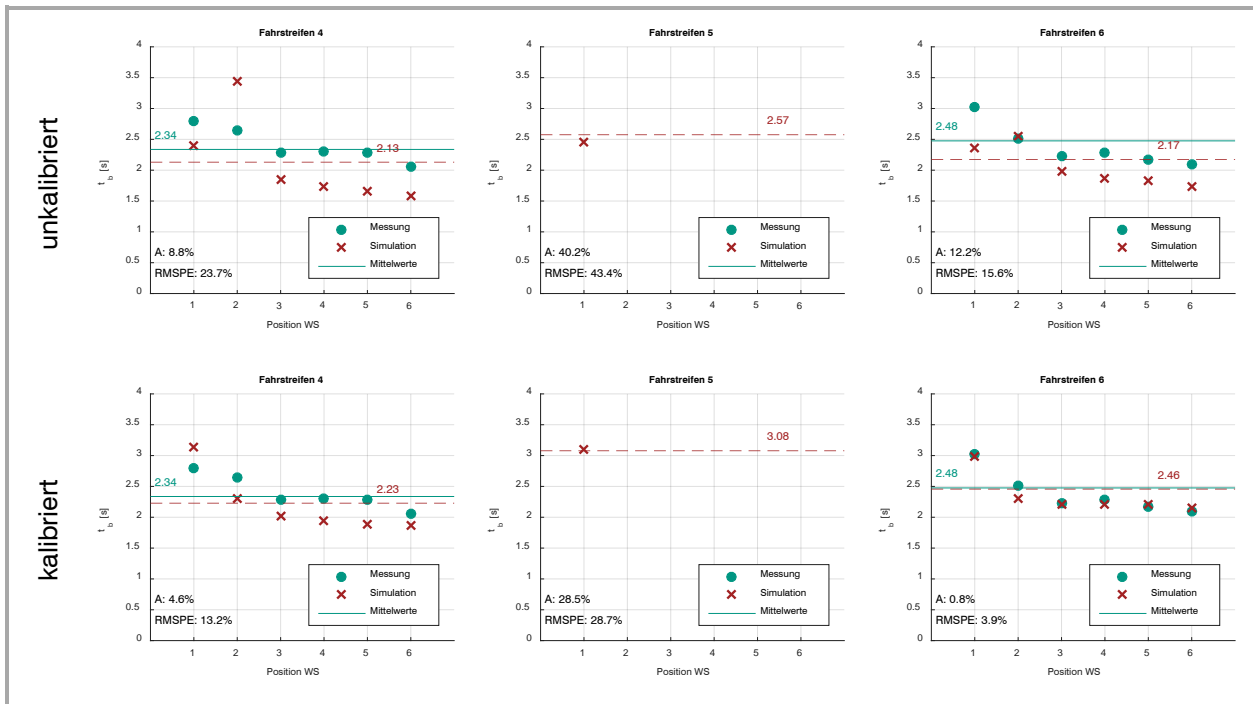
Kalibrierung Zeitbedarfswert

Gesamter Knotenpunkt



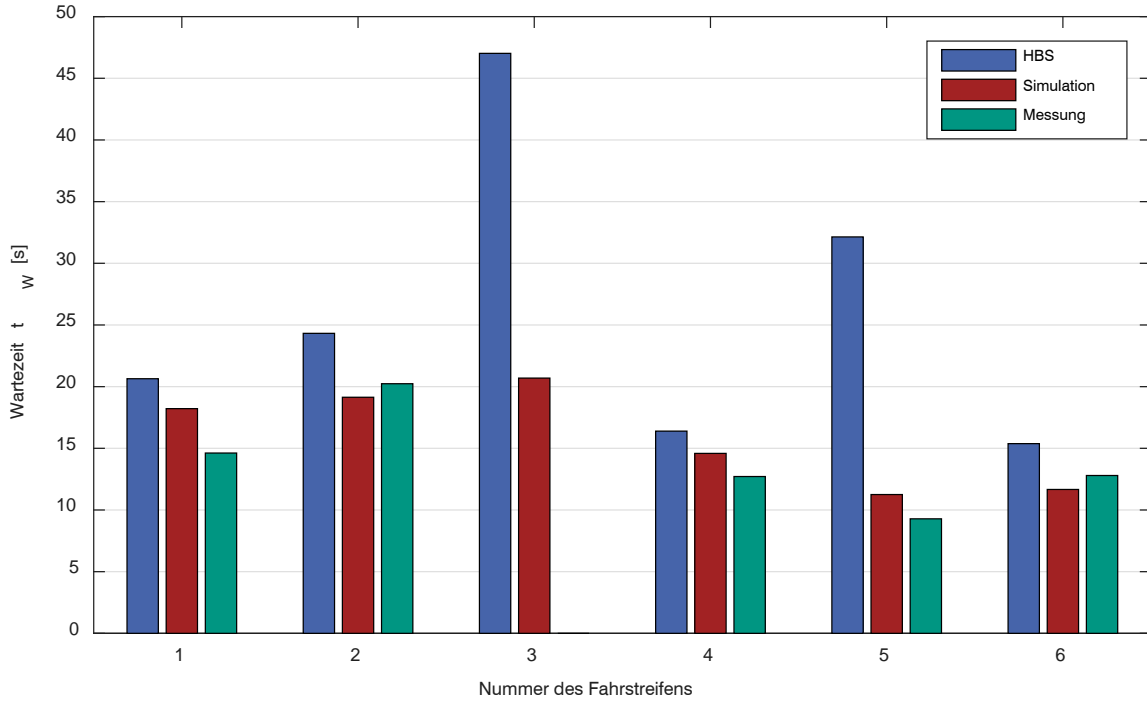
Einzelne Fahrstreifen





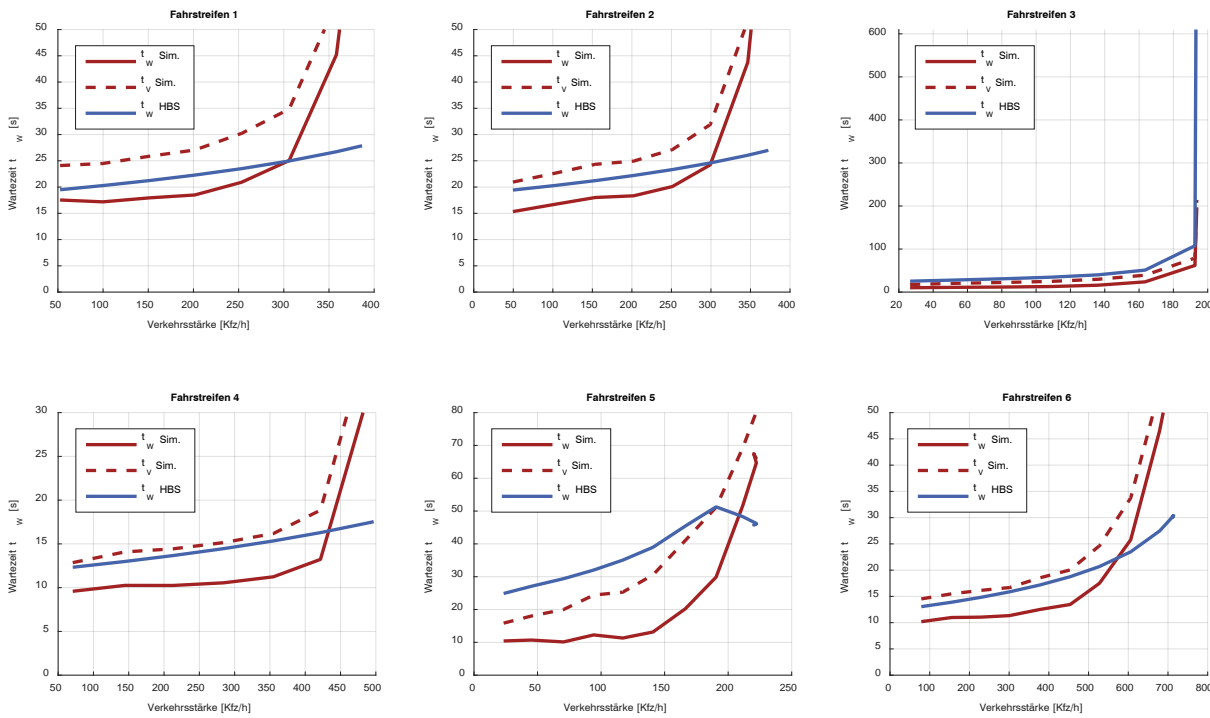
Vergleich der Wartezeit

Einzelne Fahrstreifen



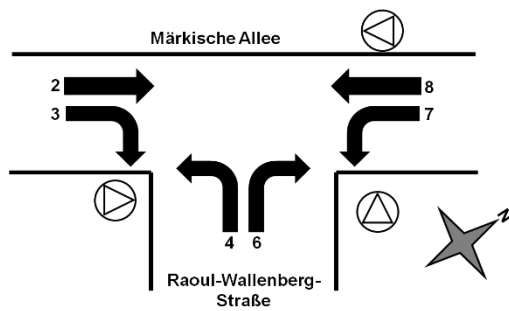
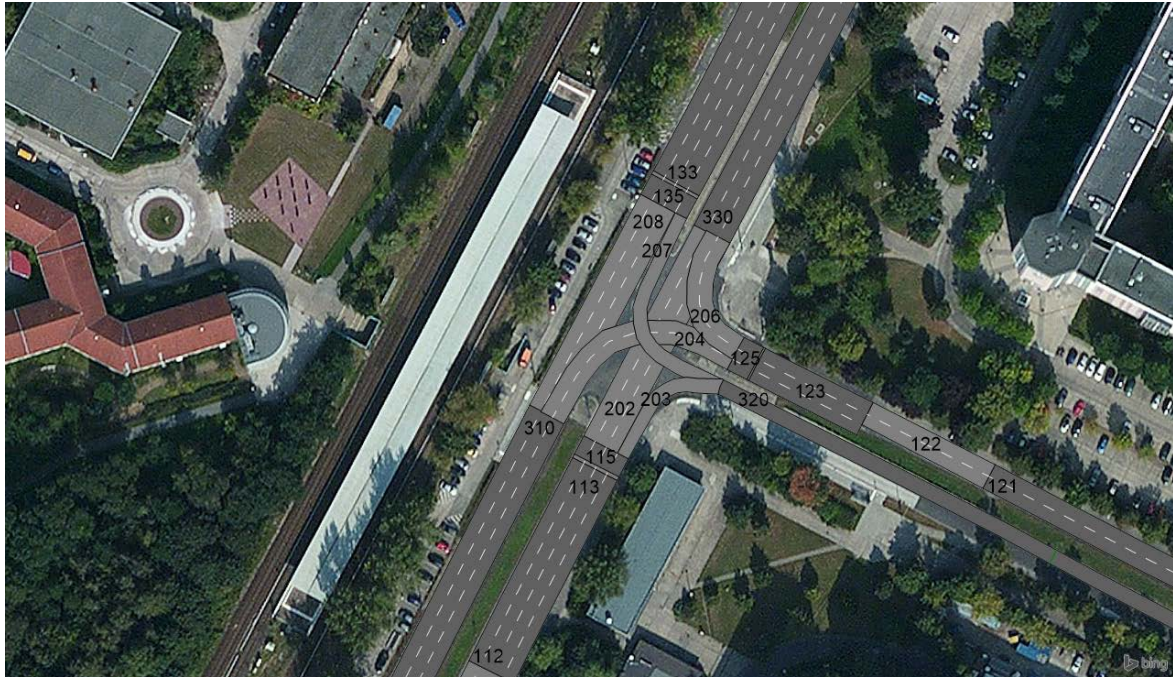
Lastfälle

Einzelne Fahrstreifen



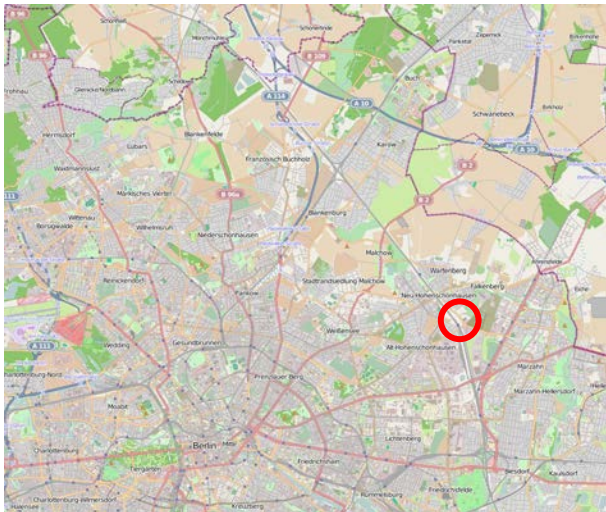
Raoul-Wallenberg-Str. / Märkische Allee (Berlin)

Typ:	LSA	Arme:	3	Lage:	innerorts
Erhebungstag:	18.09.2012 (Di)	Erhebungszeit:	15:00 – 18:00 Uhr		

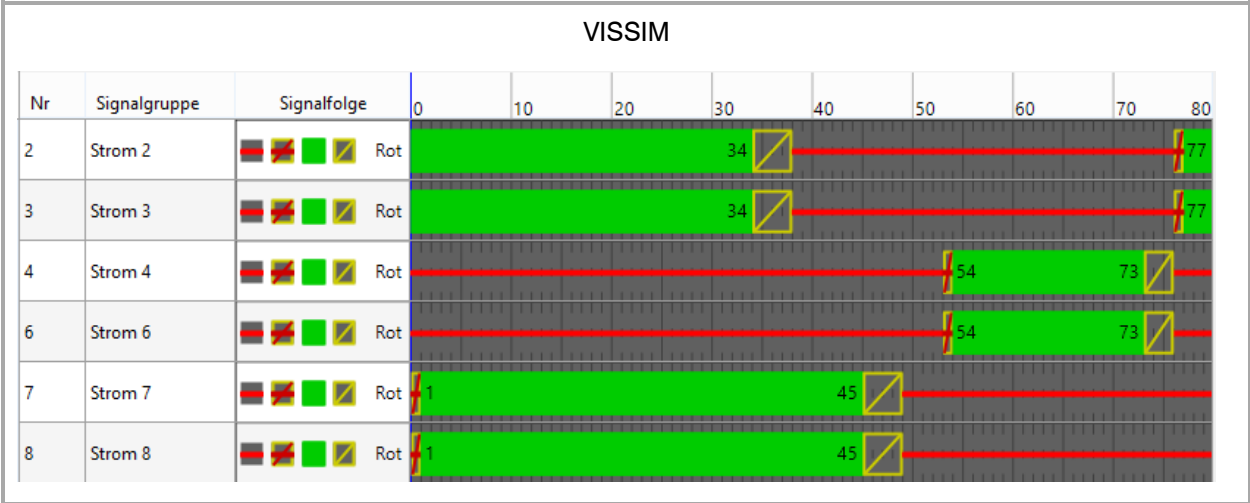
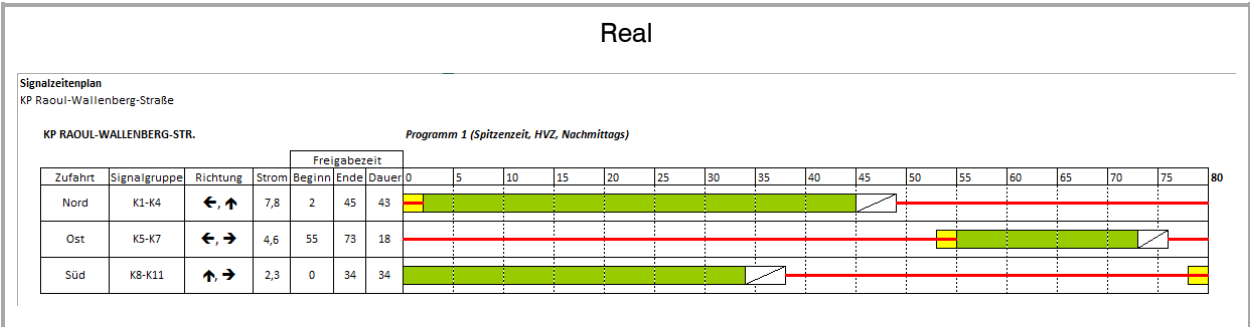


Charakteristik:

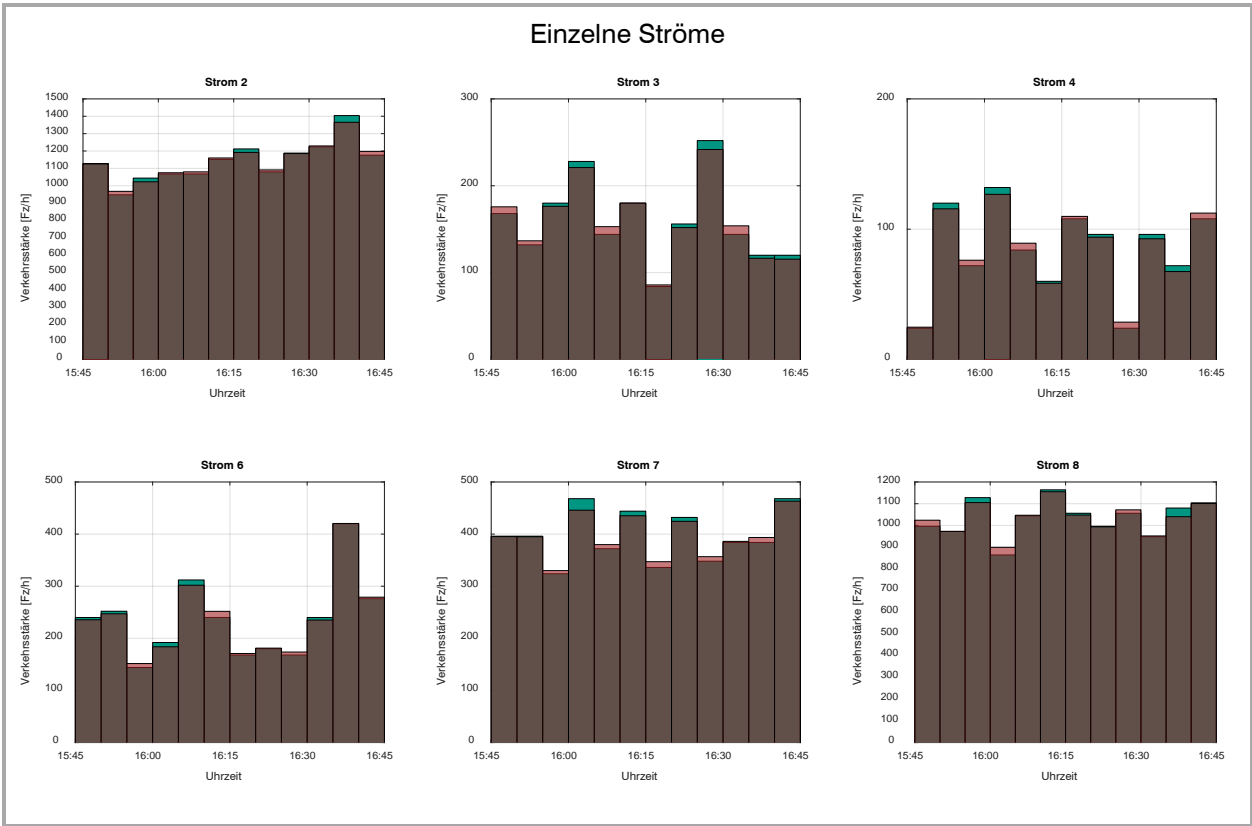
- $V_{zul}(HR)$: 50 km/h
- $V_{zul}(NR)$: 50 km/h
- **Beginn Auswertung:**
15:45 Uhr
- Q_{spitze} : 3049 Fz/h
- Verkehrsknoten
- Linienbusverkehr in HR
- bauliche Mitteltrennung in allen Zufahrten



Signalzeitenplan



Erhobene Verkehrsstärke

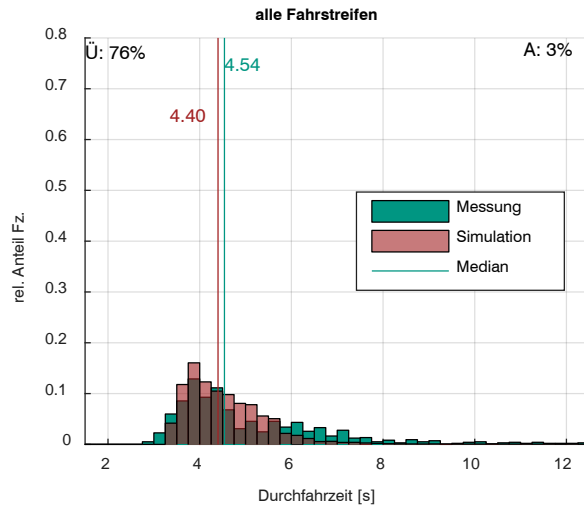
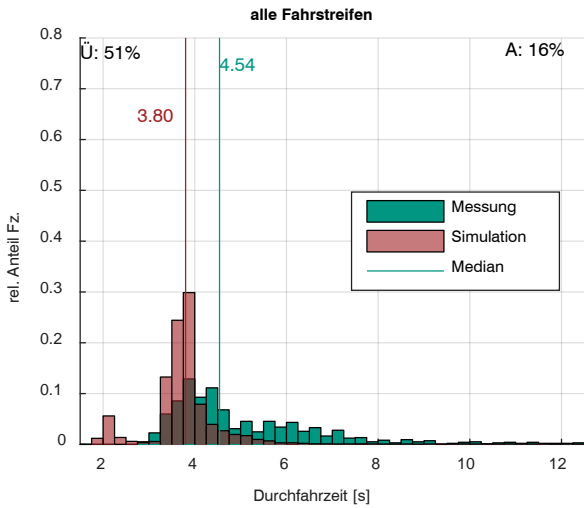


Kalibrierung Durchfahrzeit

Gesamter Knotenpunkt

unkalibriert

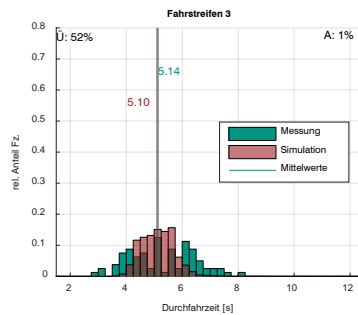
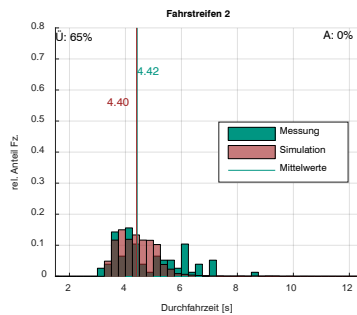
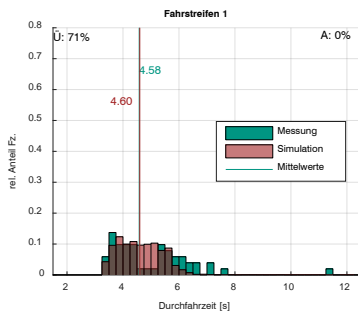
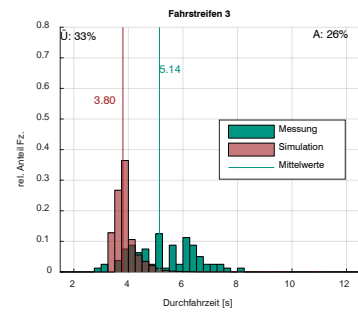
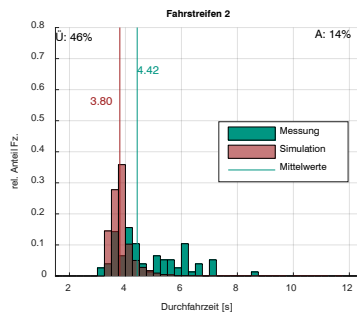
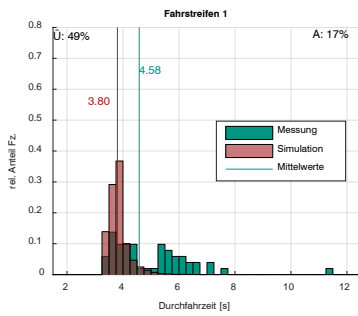
kalibriert

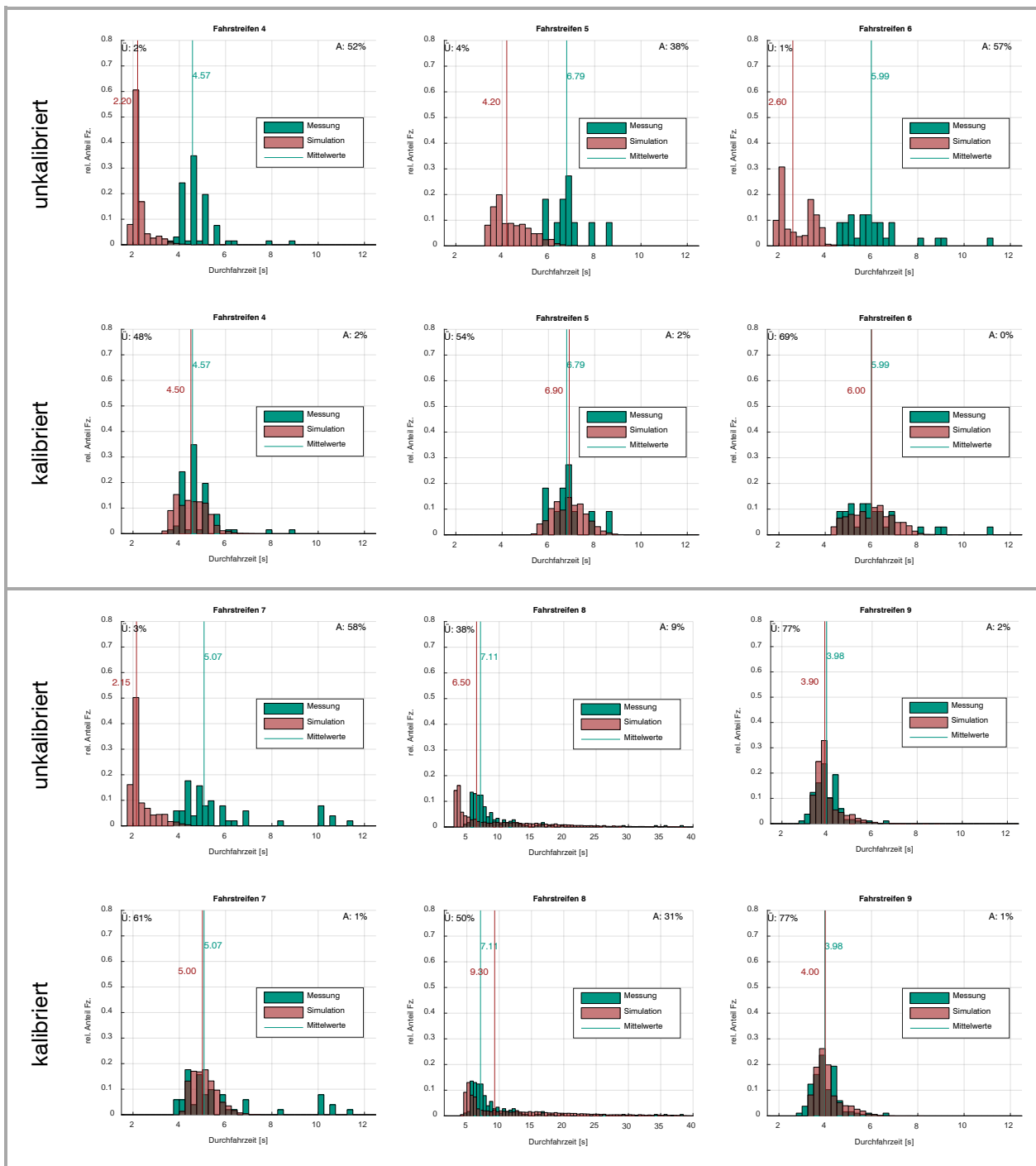


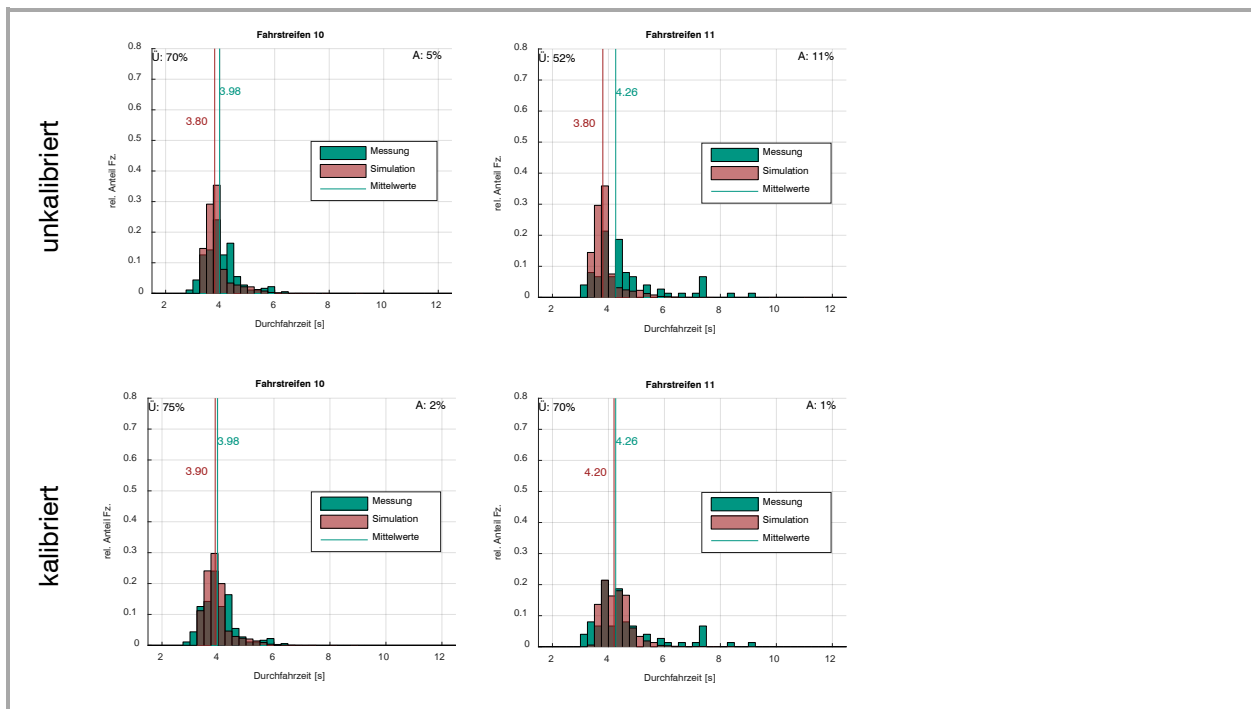
Einzelne Fahrstreifen

unkalibriert

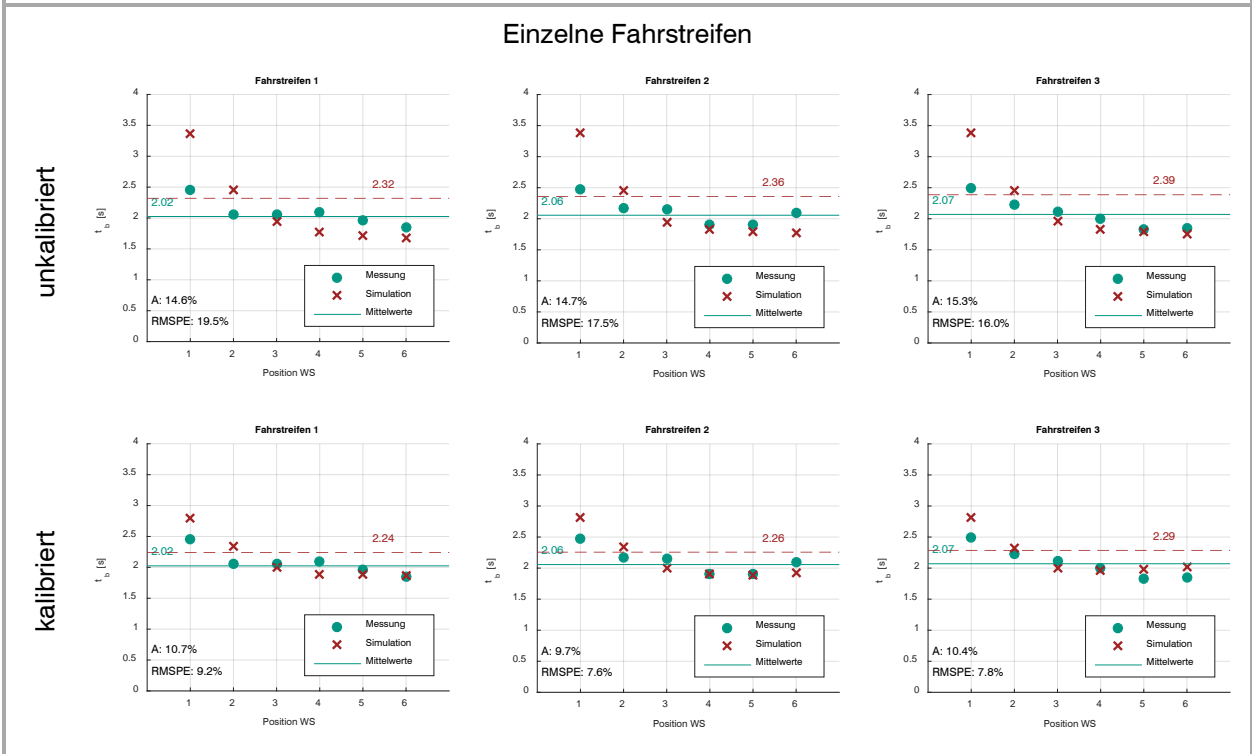
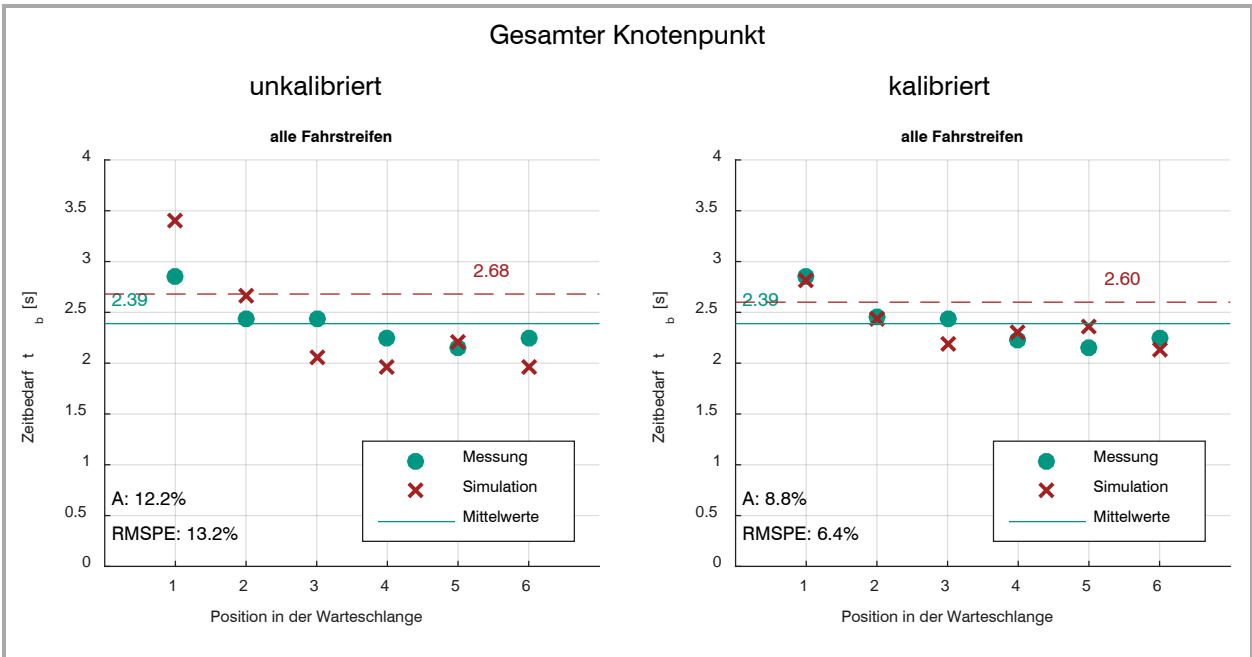
kalibriert

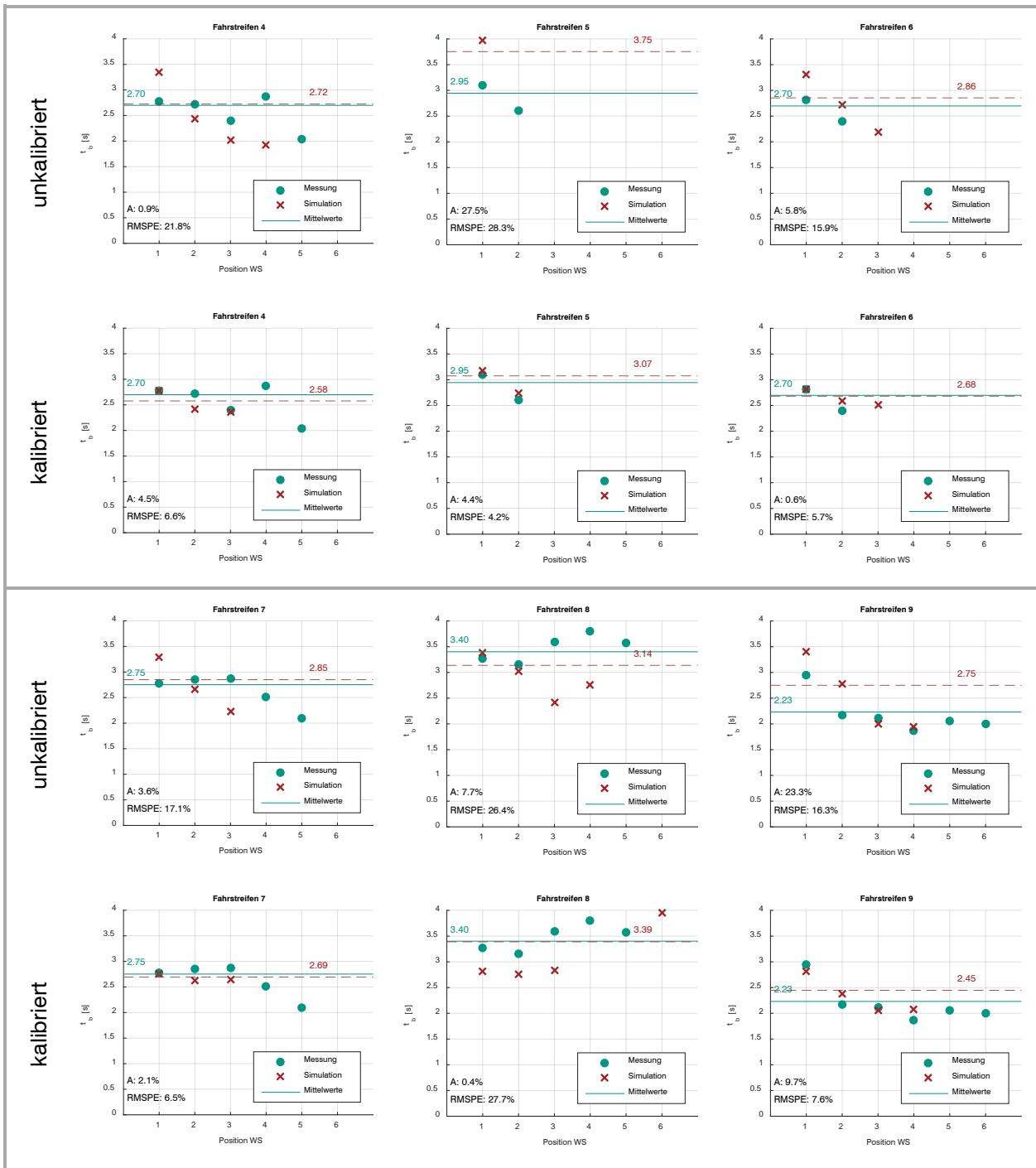


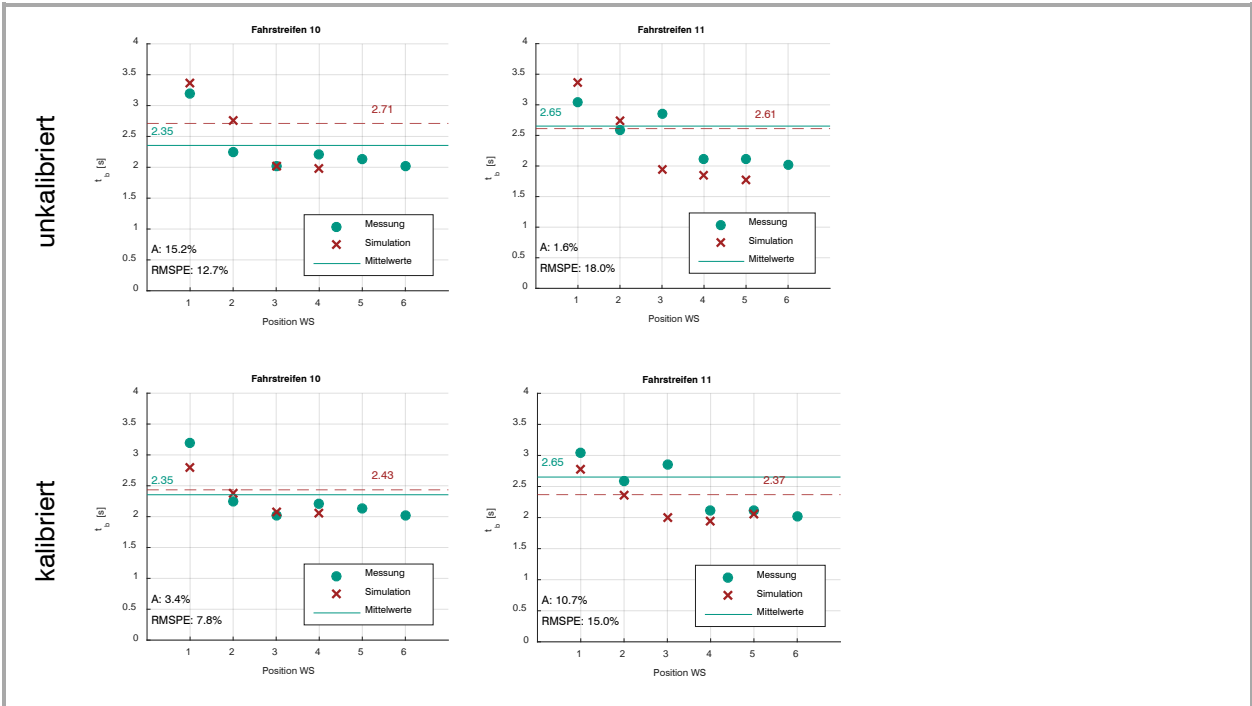




Kalibrierung Zeitbedarfswert

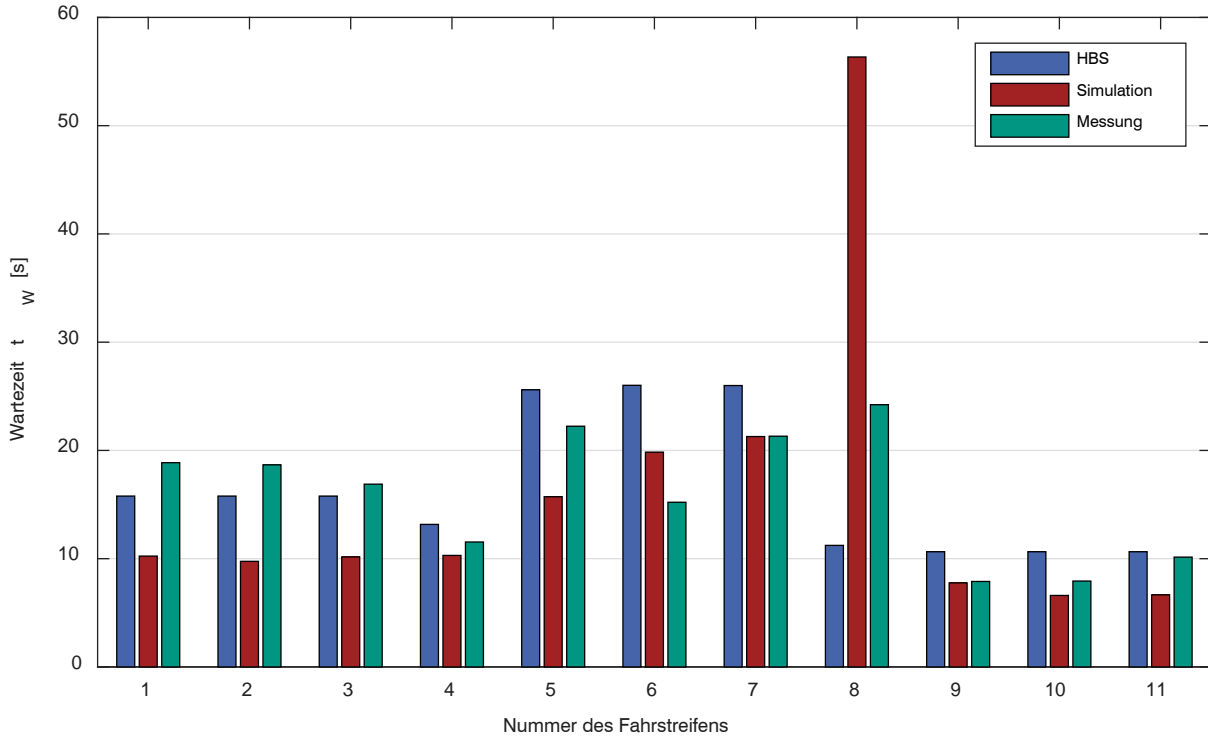






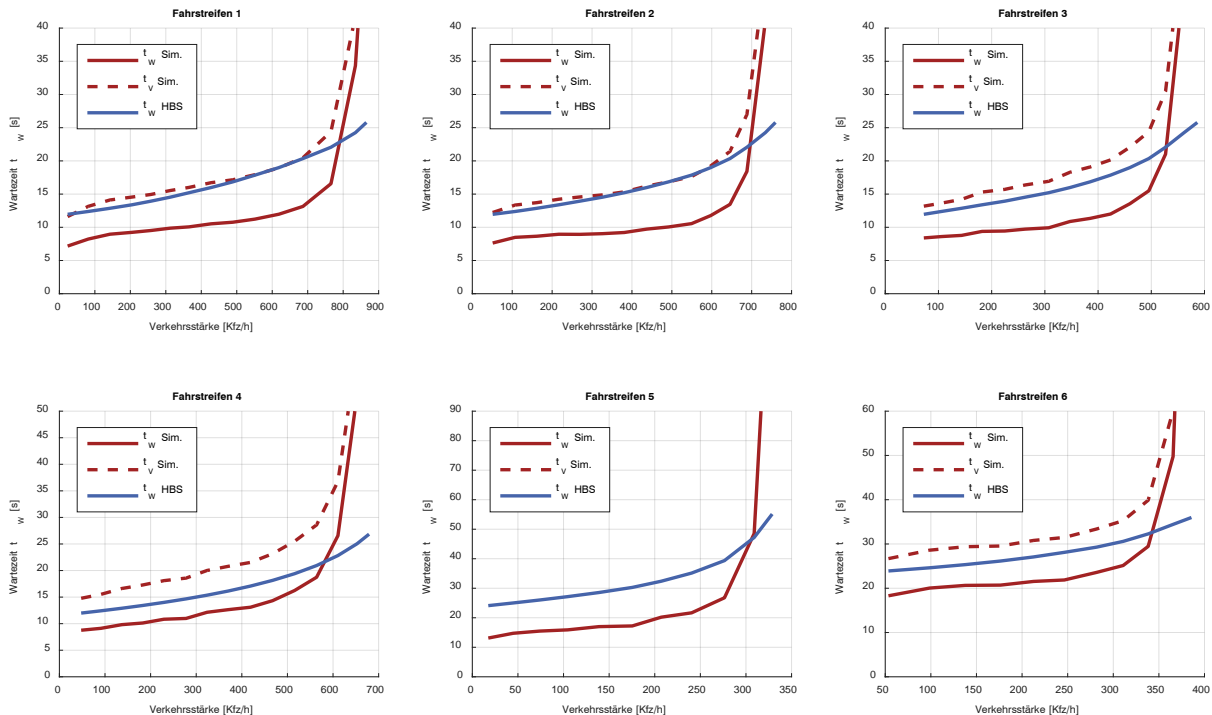
Vergleich der Wartezeiten

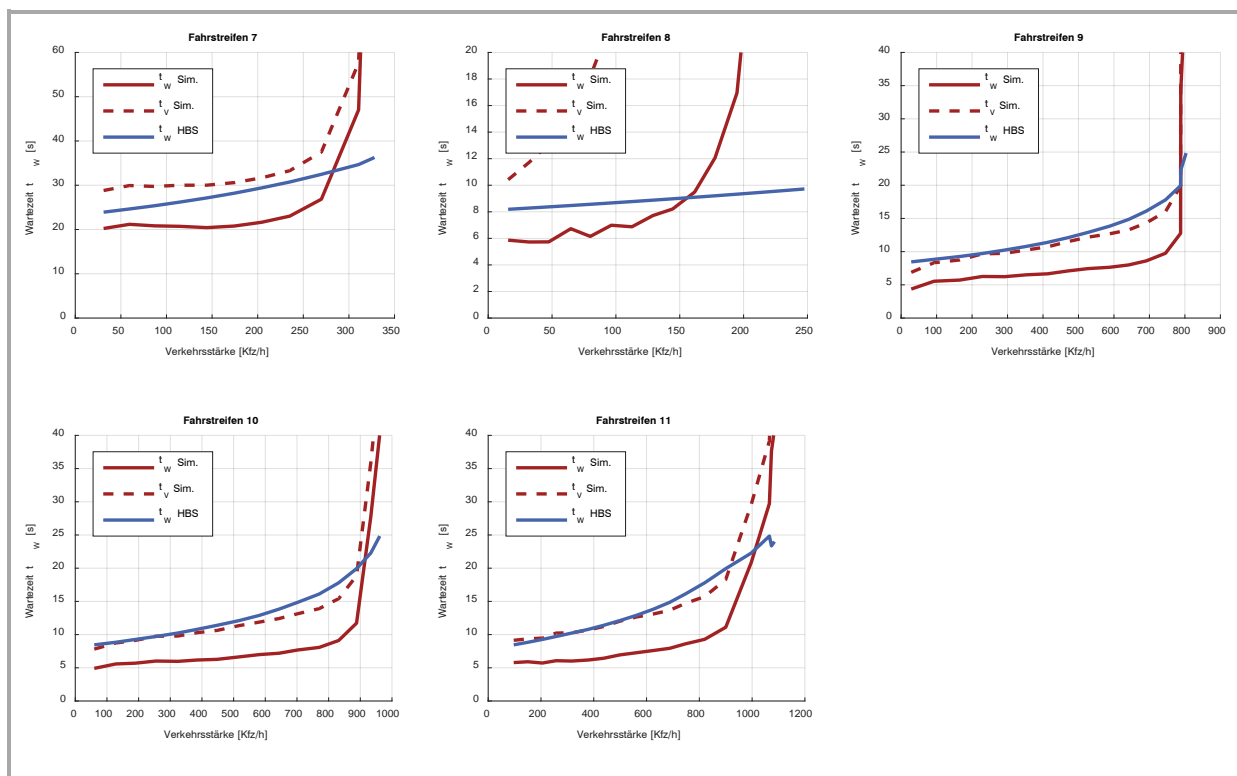
Einzelne Fahrstreifen



Lastfälle

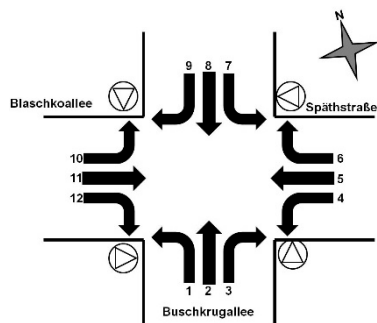
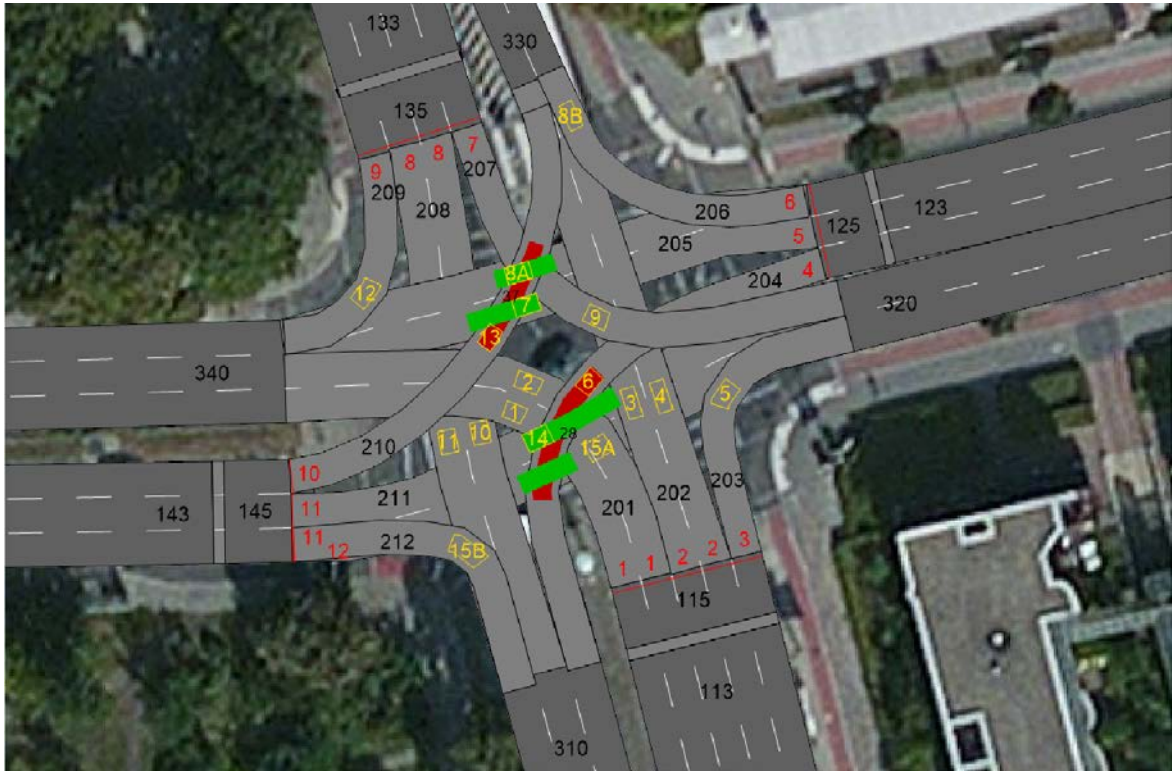
Einzelne Fahrstreifen





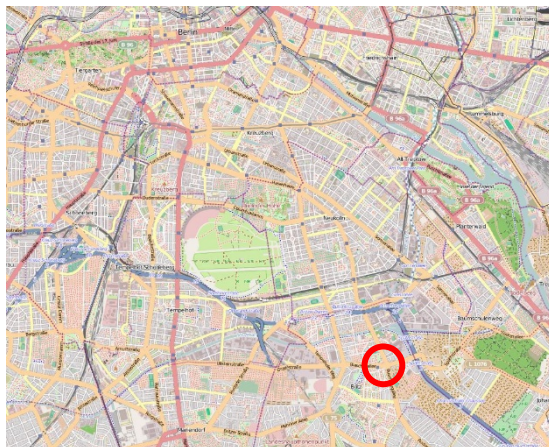
Buschkrugallee / Blaschkoallee (Berlin)

Typ:	LSA	Arme:	4	Lage:	innerorts
Erhebungstag:	18.09.2012 (Di)	Erhebungszeit:	07:30 – 10:00 Uhr		



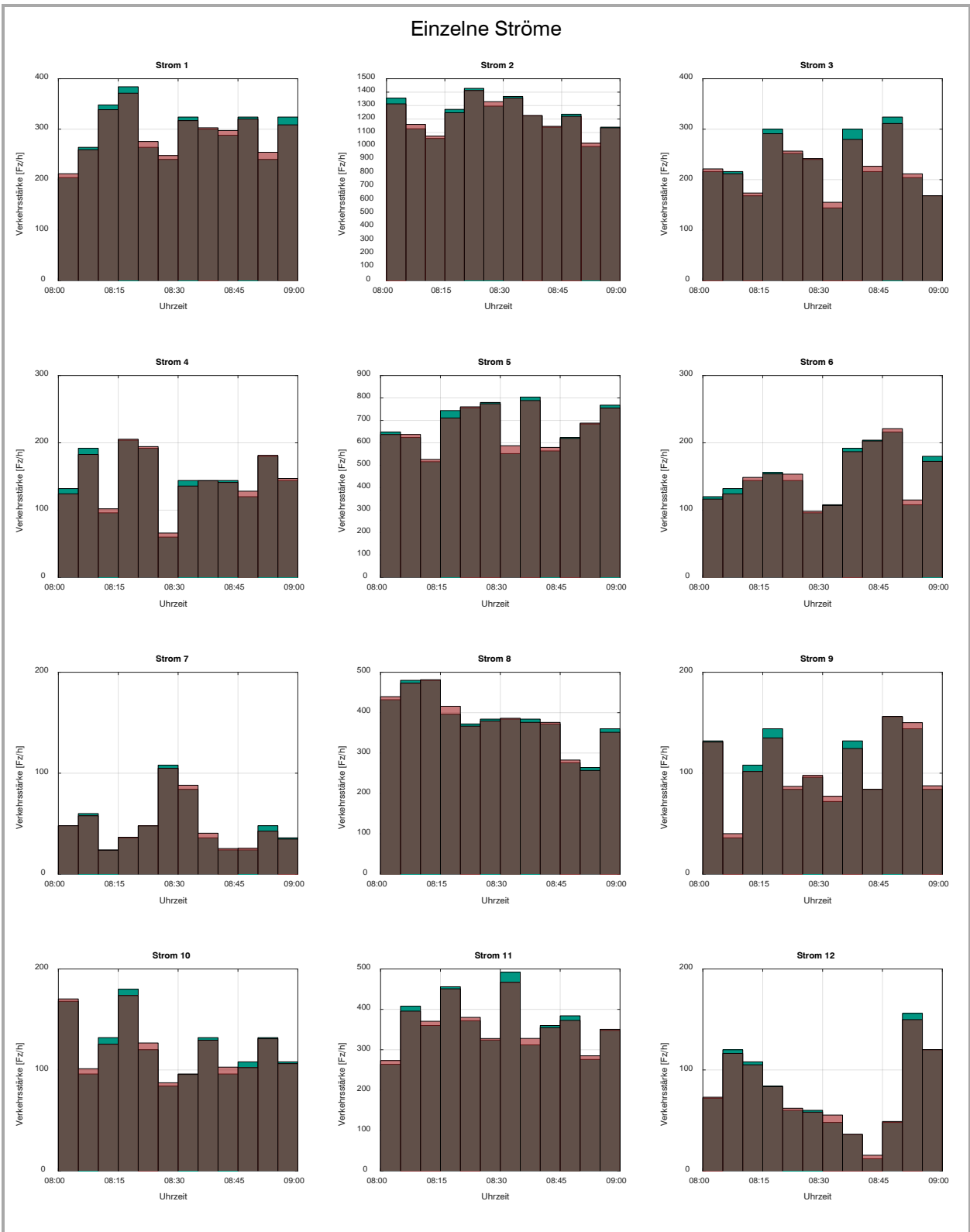
Charakteristik:

- $V_{zul} (HR)$: 50 km/h
- $V_{zul} (NR)$: 50 km/h
- Beginn Auswertung: 08:00 Uhr
- Q_{spitze} : 3806 Fz/h
- Verkehrsknoten
- Mitteltrennung in Zufahrten West und Süd
- Mittelinsel in Zufahrt Nord
- Linienbusverkehr



Erhobene Verkehrsstärke

Einzelne Ströme

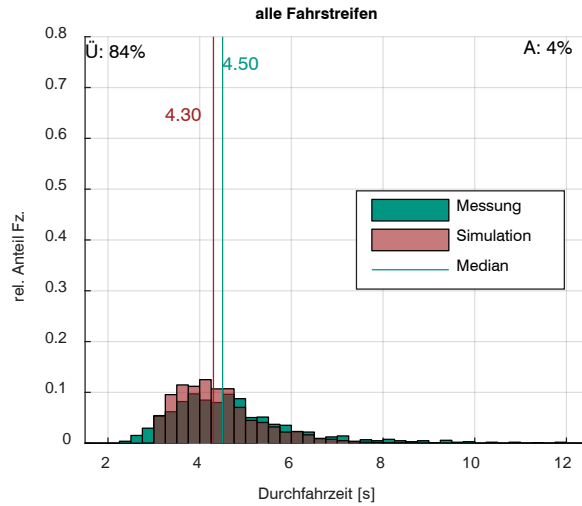
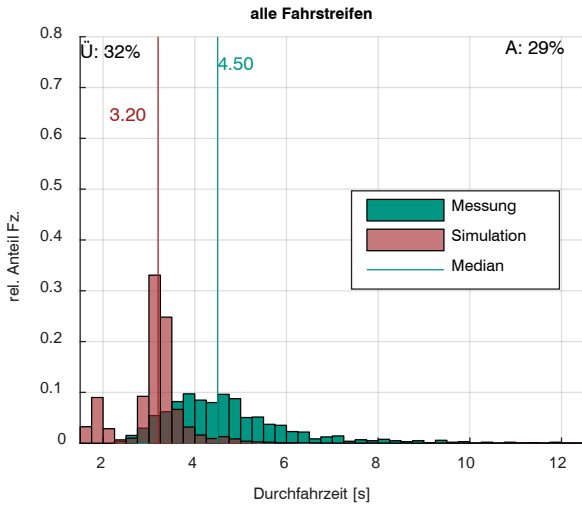


Kalibrierung Durchfahrzeit

Gesamter Knotenpunkt

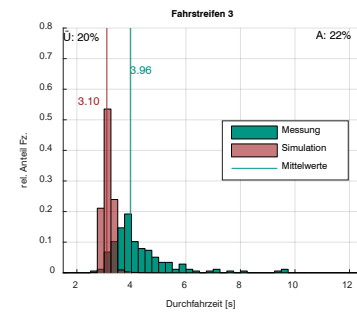
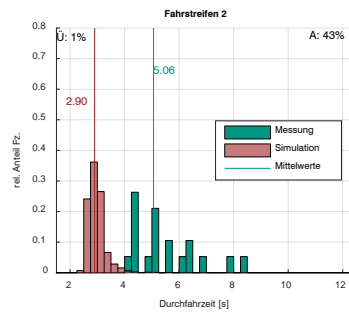
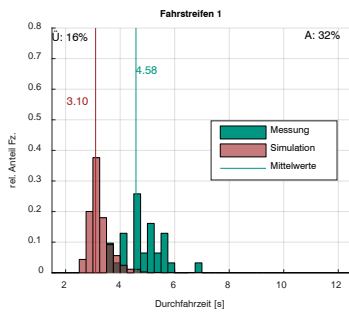
unkalibriert

kalibriert

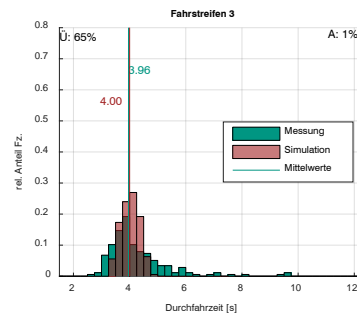
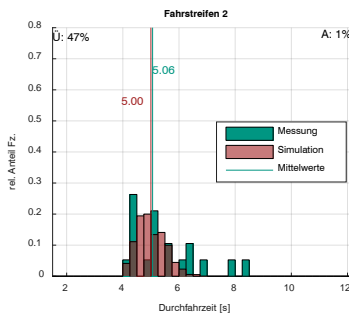
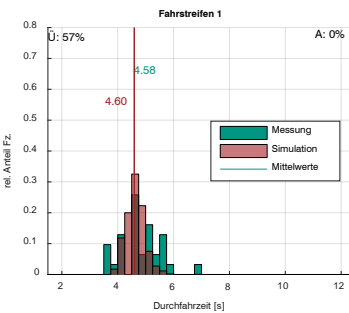


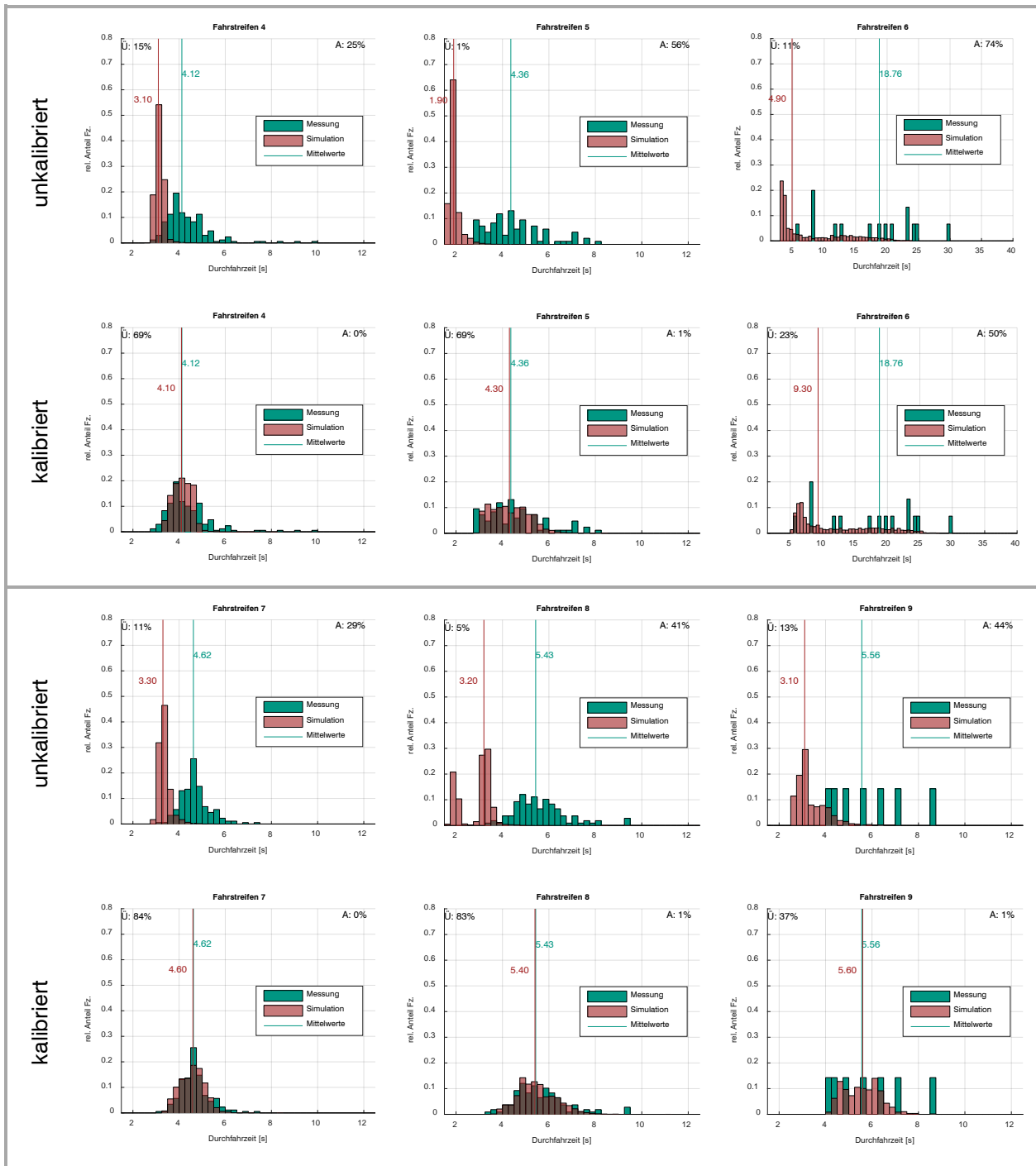
Einzelne Fahrstreifen

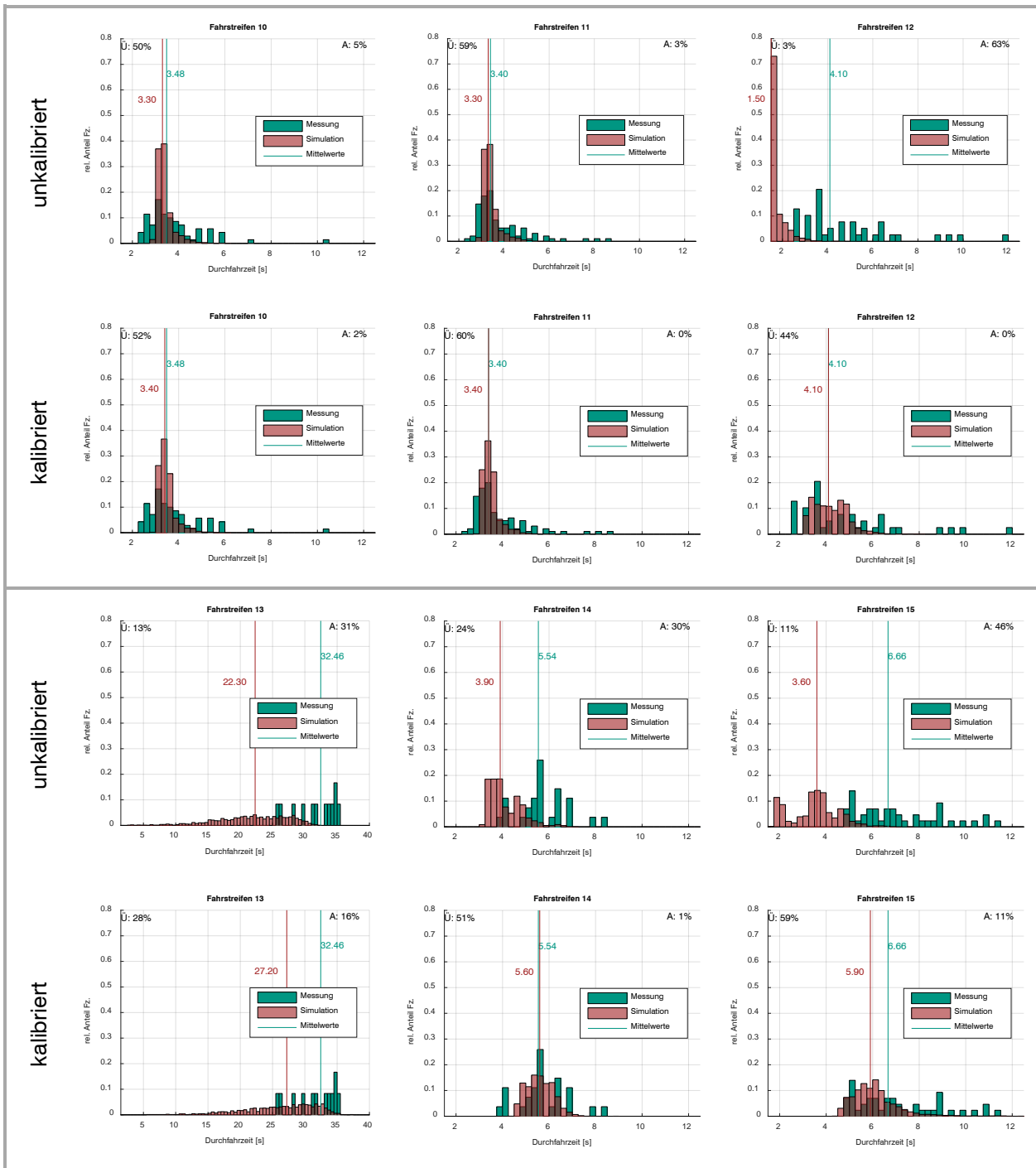
unkalibriert



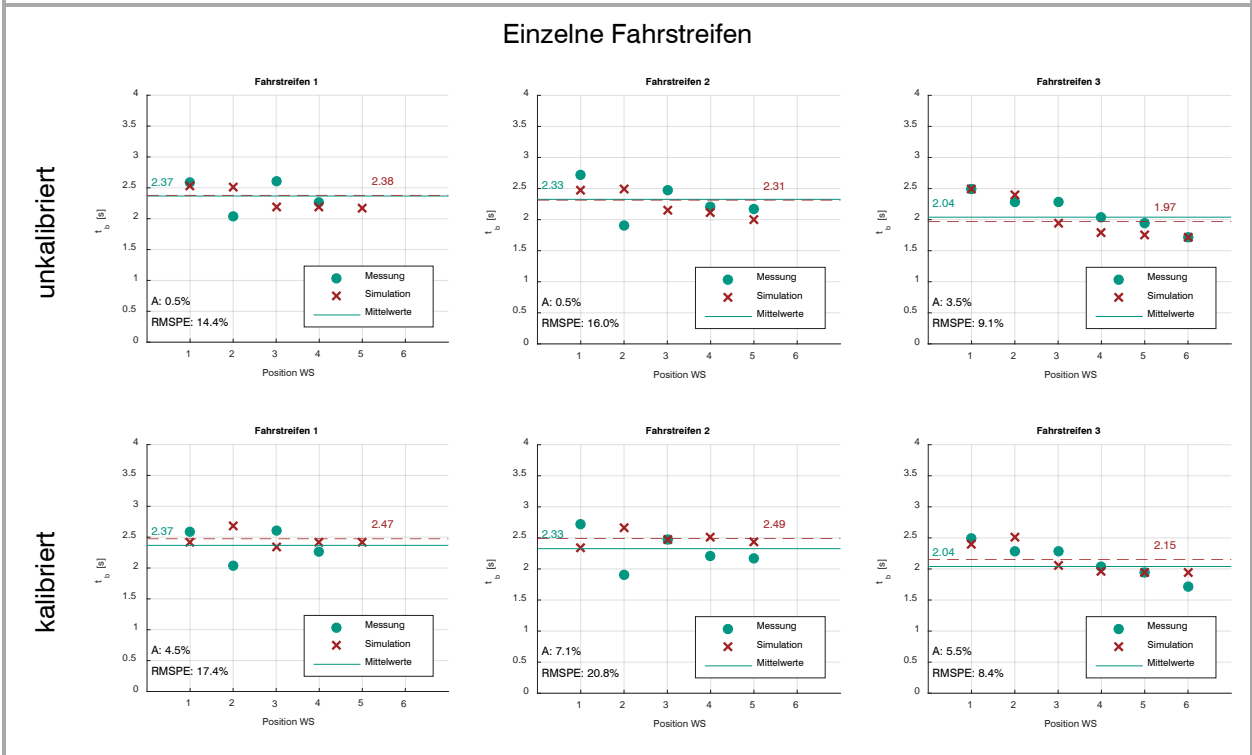
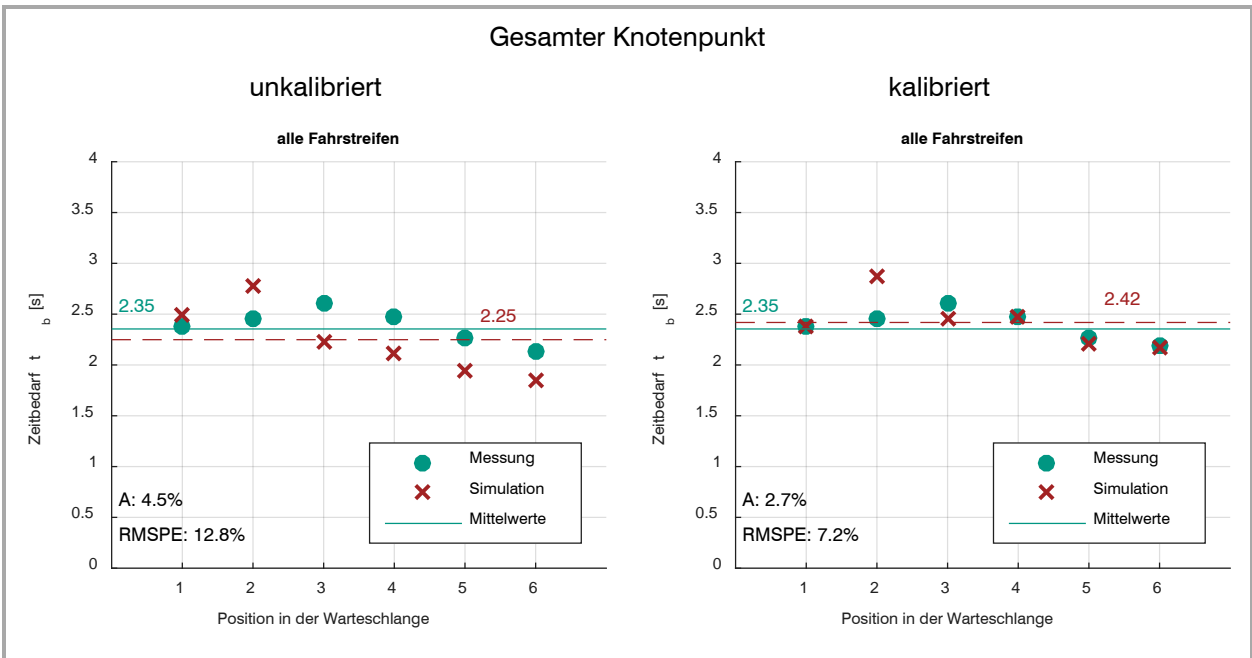
kalibriert

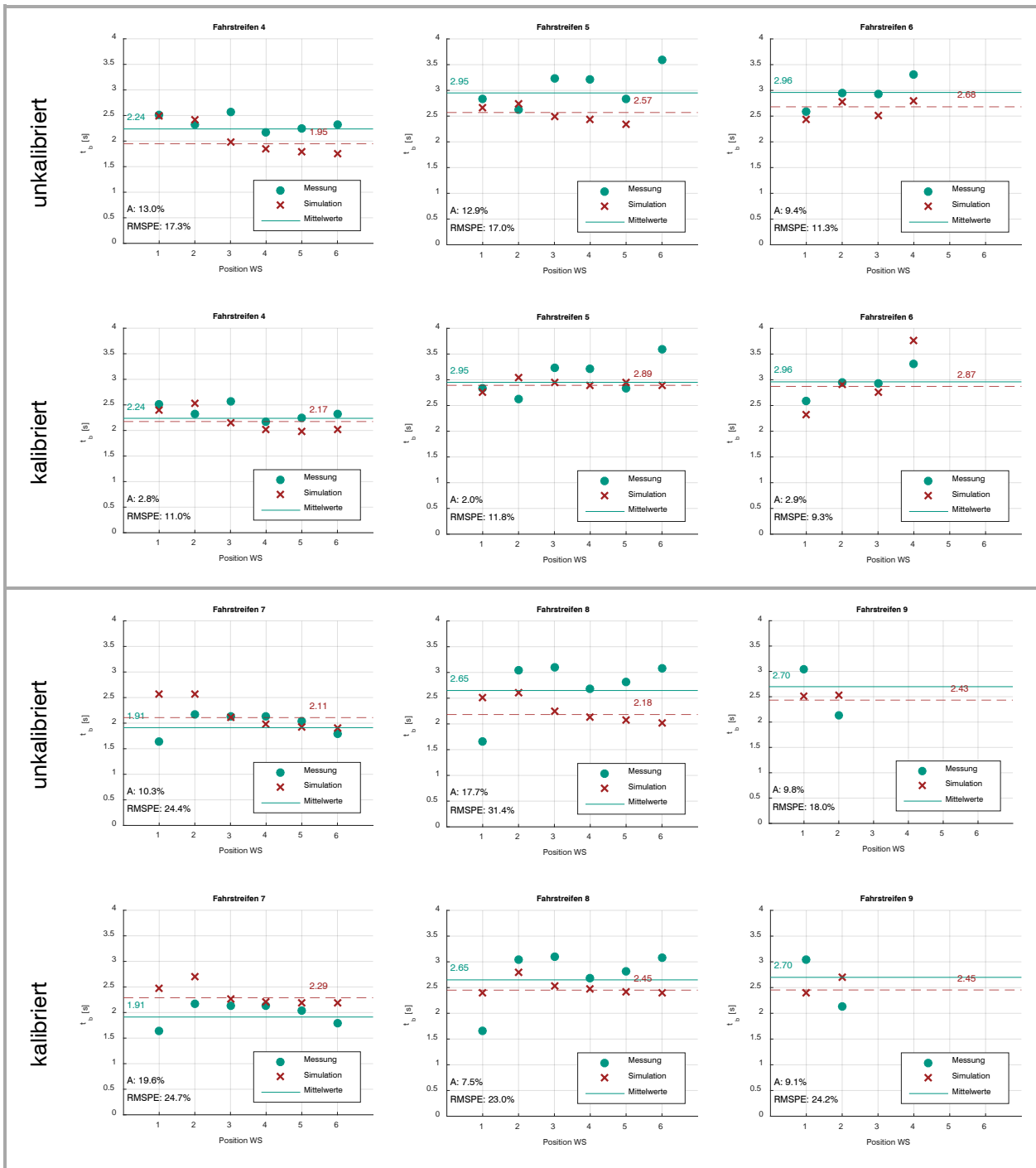


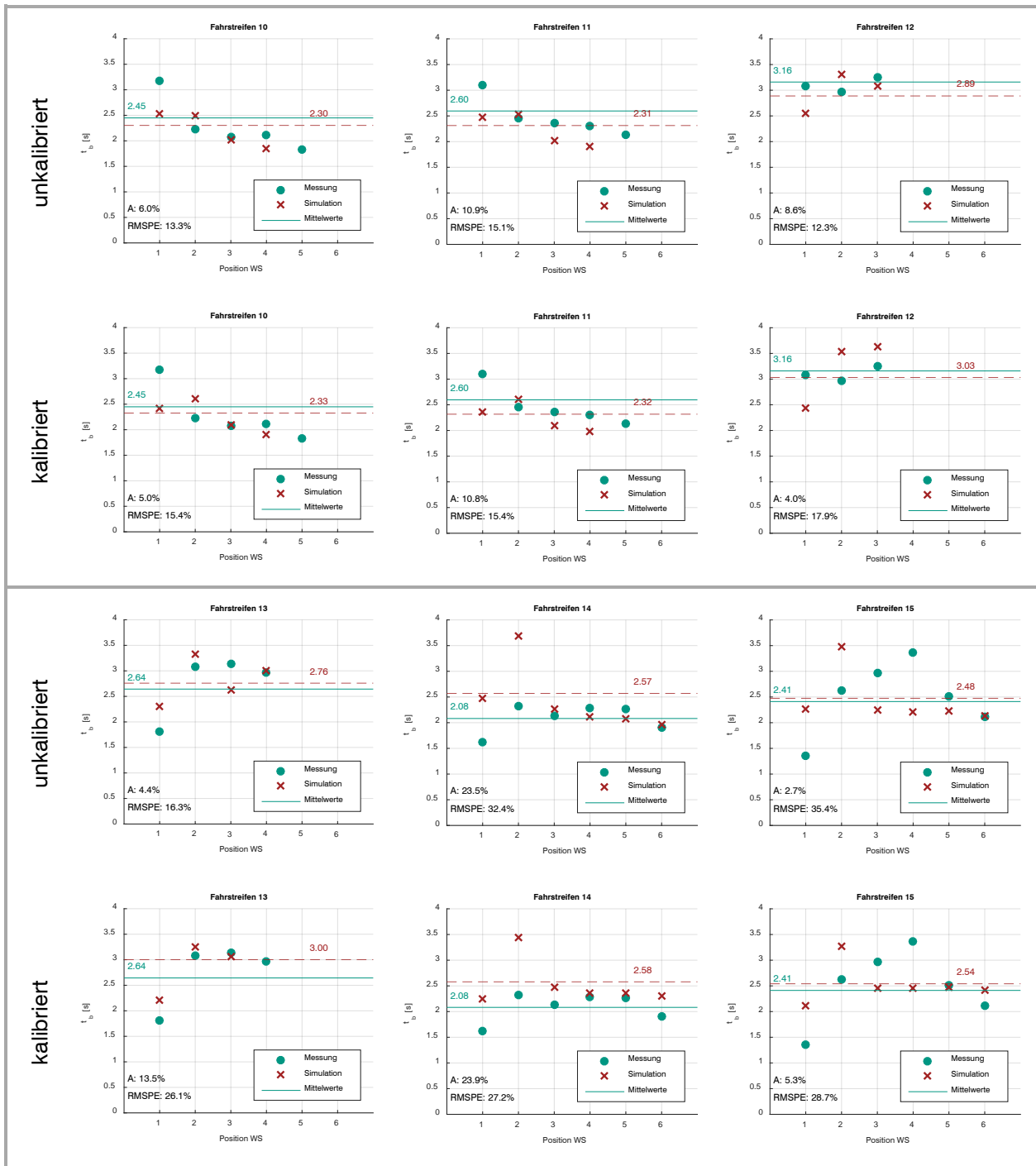




Kalibrierung Zeitbedarfswert

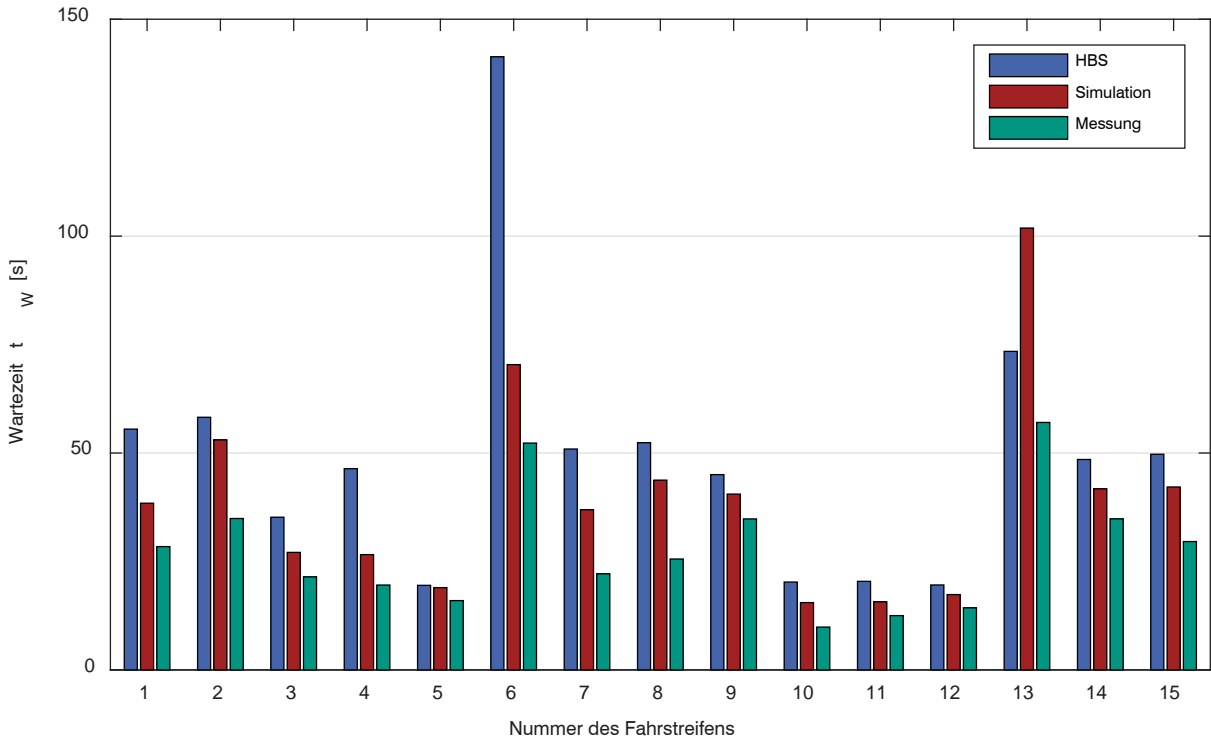






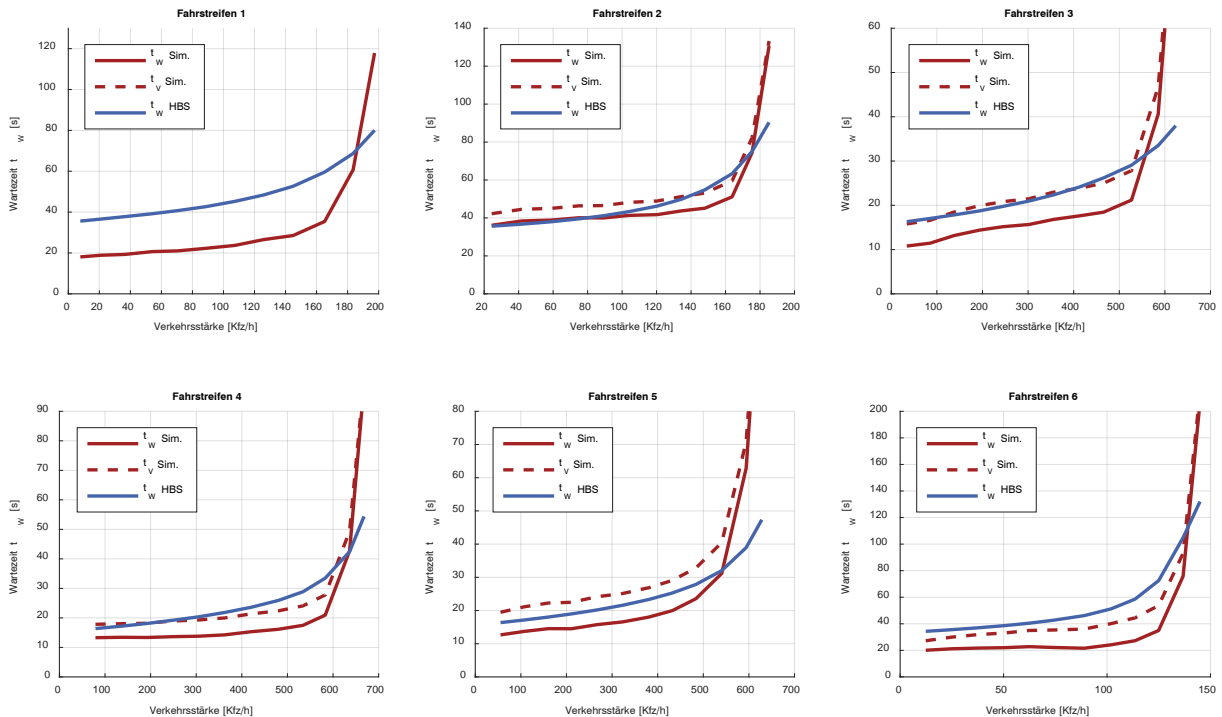
Vergleich der Wartezeiten

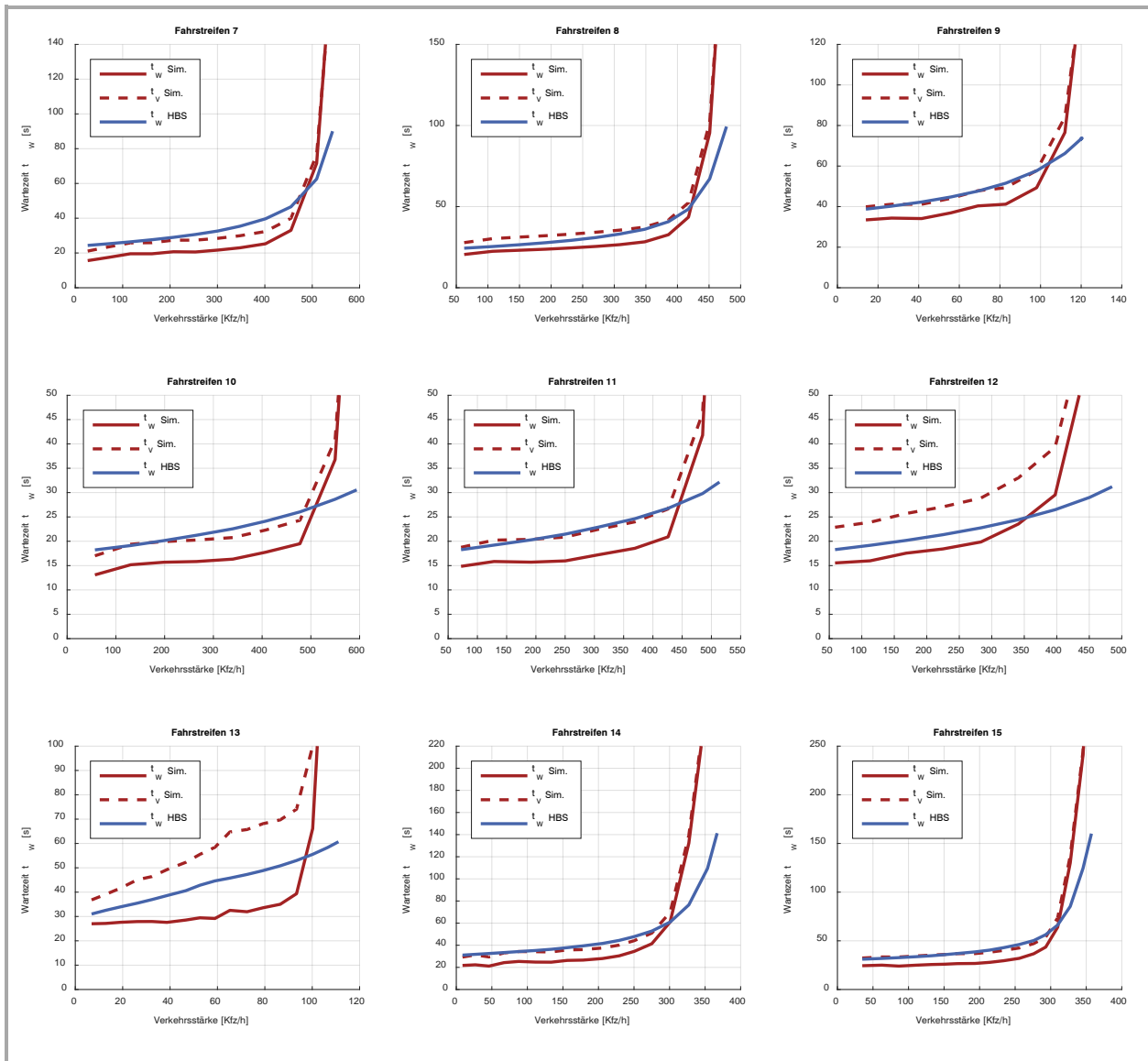
Einzelne Fahrstreifen



Lastfälle

Einzelne Fahrstreifen

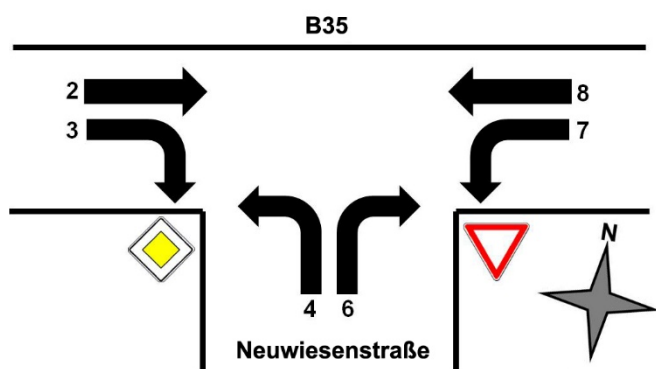




Anhang II: Knotenpunkte ohne Lichtsignalanlage

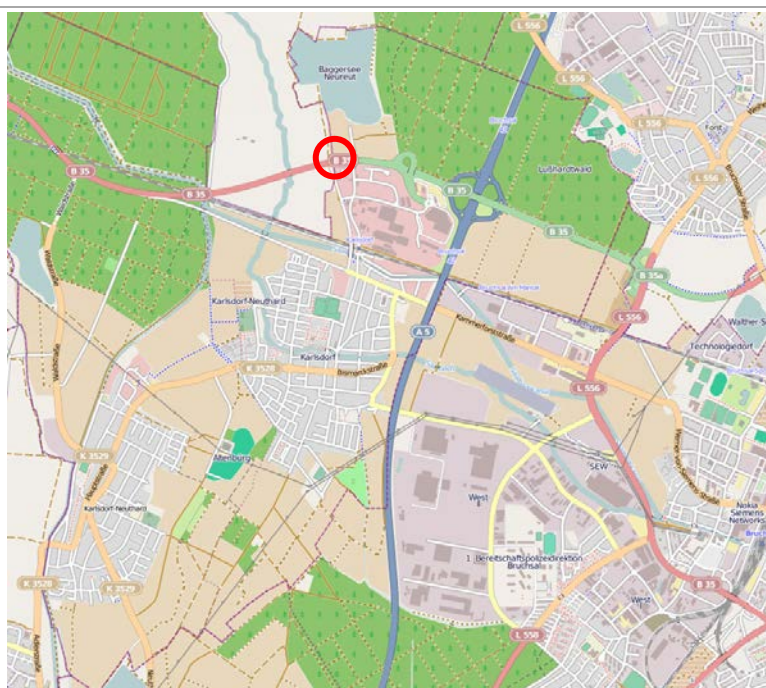
B35 / Neuwiesenstraße (Karlsdorf-Neuthard)

Typ:	VZ	Arme:	3	Lage:	außerorts
Erhebungstag:	14.11.2012 (Mi)	Erhebungszeit:	06:00 – 10:00 Uhr		



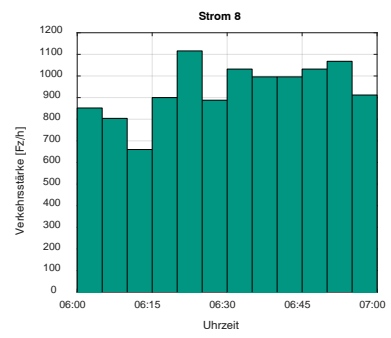
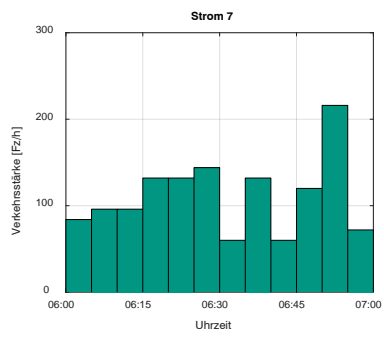
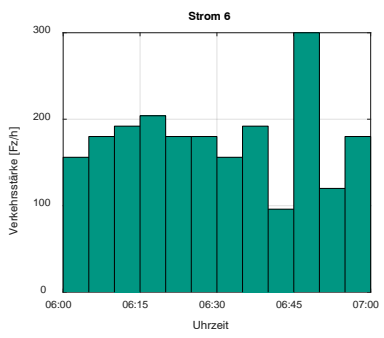
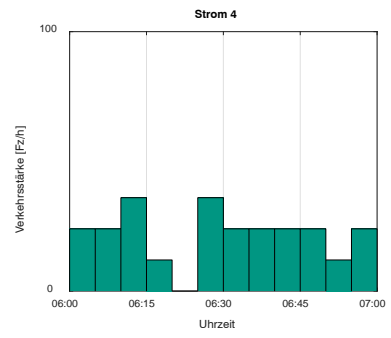
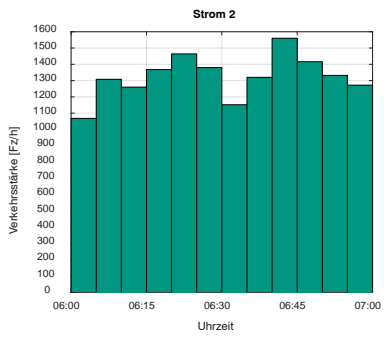
Charakteristik:

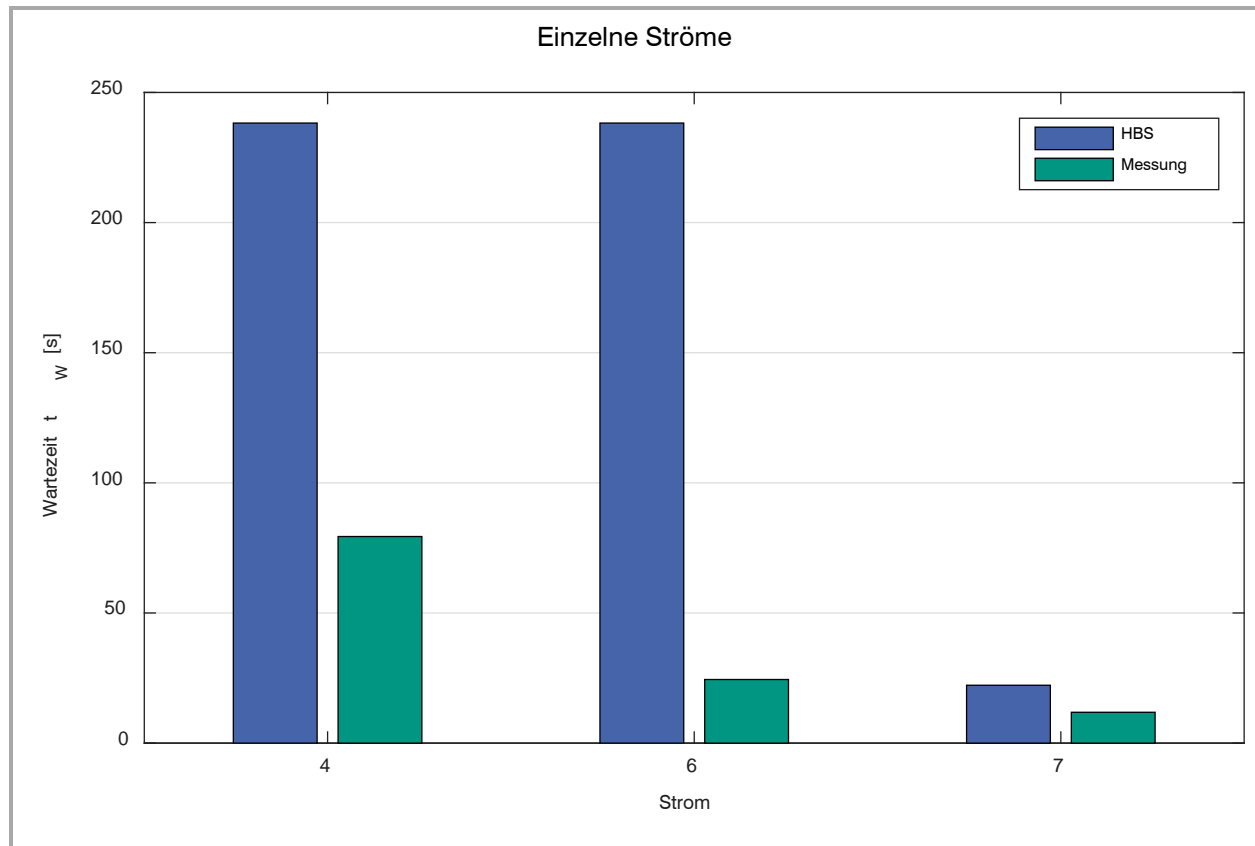
- $V_{zul(HR)}$: 70 km/h
- $V_{zul(NR)}$: 50 km/h
- Beginn Auswertung: 06:00 Uhr
- Q_{spitze} : 2575 Fz/h
- Verkehrsknoten
- Parallelaufstellung in NR möglich
- bauliche Mitteltrennung in NR
- Dreiecksinsel mit anschließender vorfahrtsrechtlicher Unterordnung in Strom 3



Erhobene Verkehrsstärke

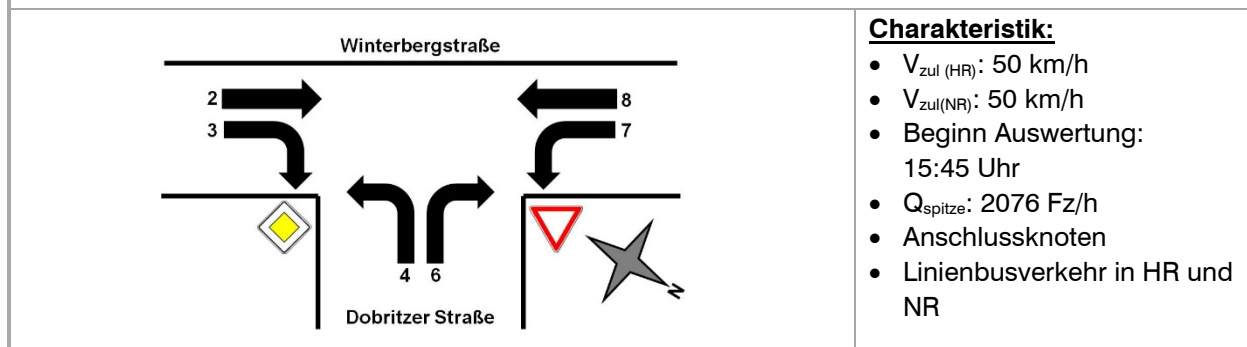
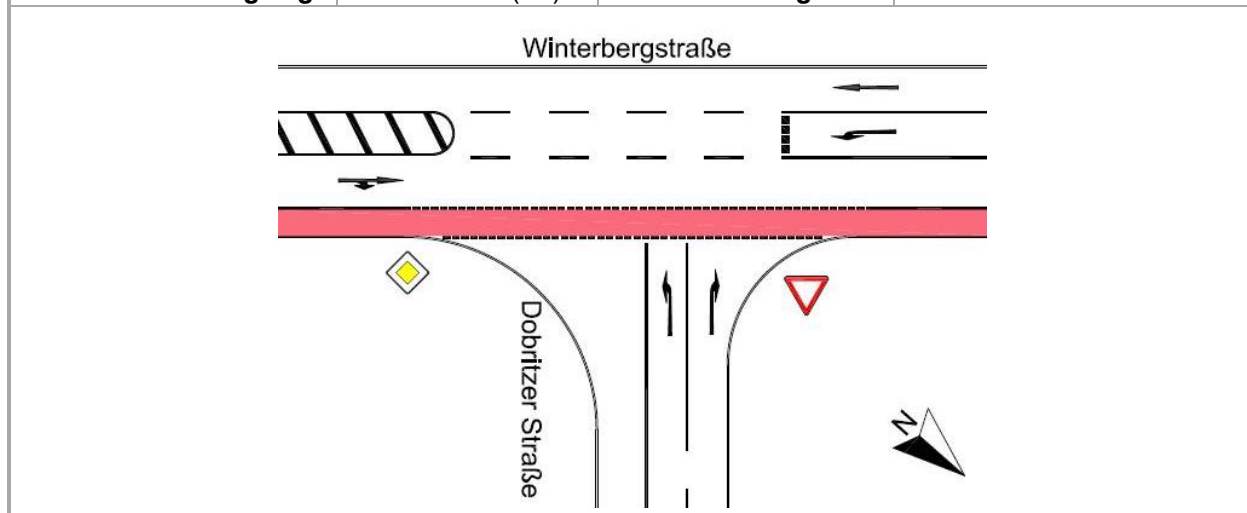
Einzelne Ströme



Vergleich der Wartezeiten

Winterbergstraße / Dobritzer Straße (Dresden)

Typ:	VZ	Arme:	3	Lage:	innerorts
Erhebungstag:	20.09.2012 (Do)	Erhebungszeit:	15:00 – 18:00 Uhr		



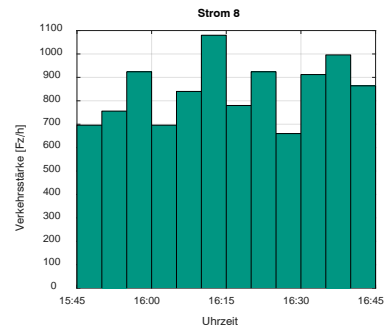
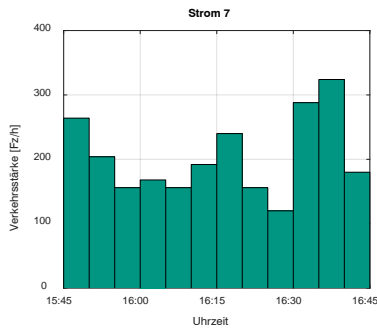
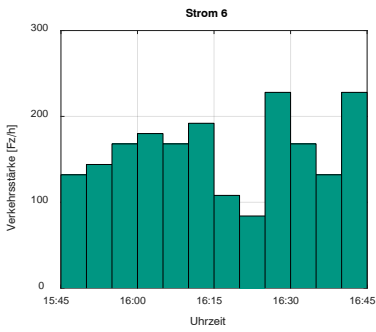
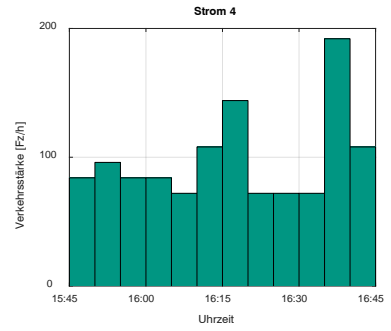
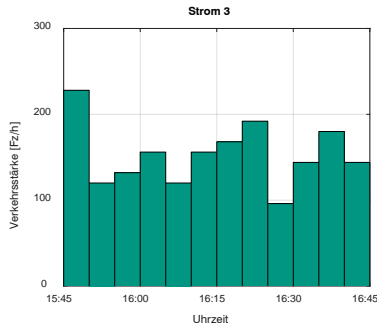
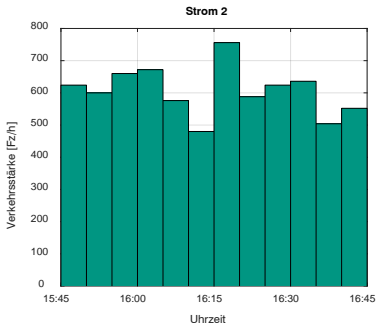
Charakteristik:

- $V_{zul} (HR)$: 50 km/h
- $V_{zul} (NR)$: 50 km/h
- Beginn Auswertung: 15:45 Uhr
- Q_{spitze} : 2076 Fz/h
- Anschlussknoten
- Linienbusverkehr in HR und NR

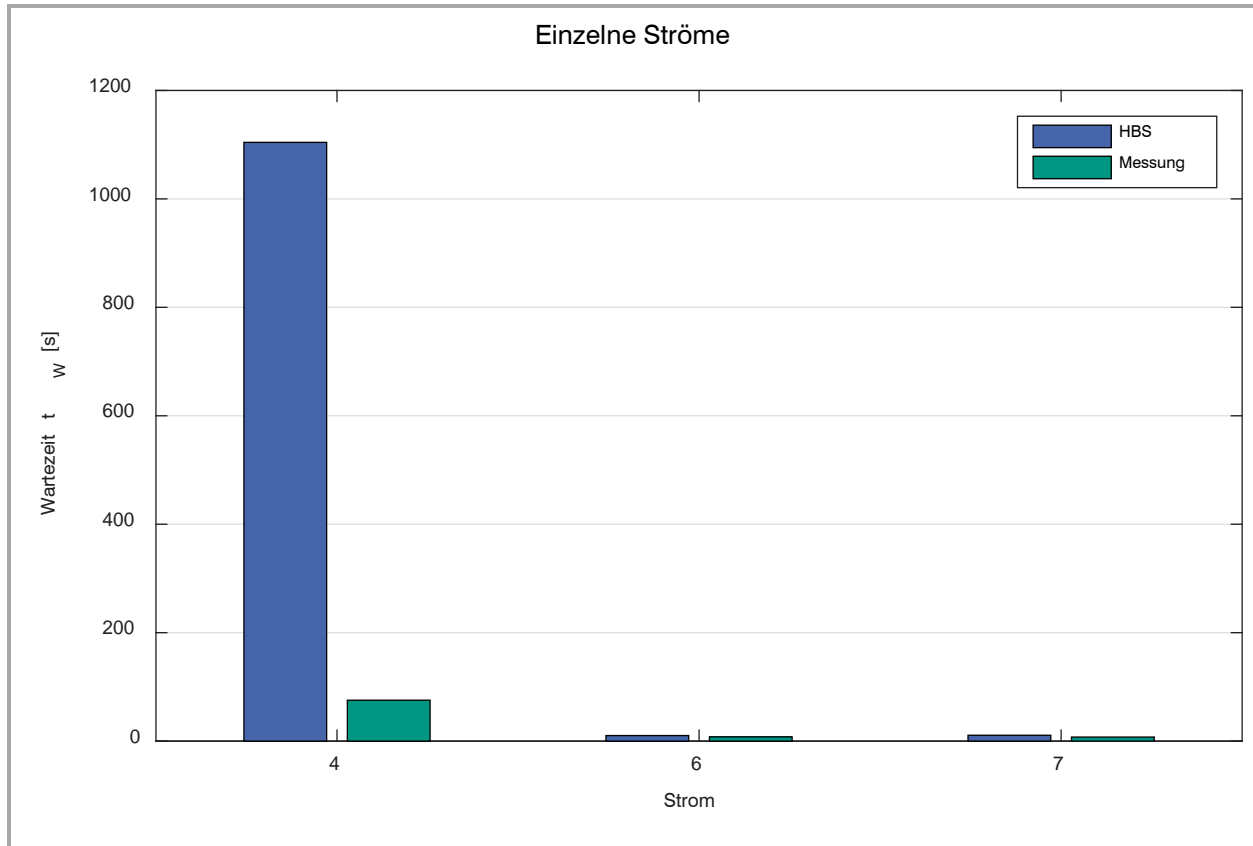


Erhobene Verkehrsstärke

Einzelne Ströme

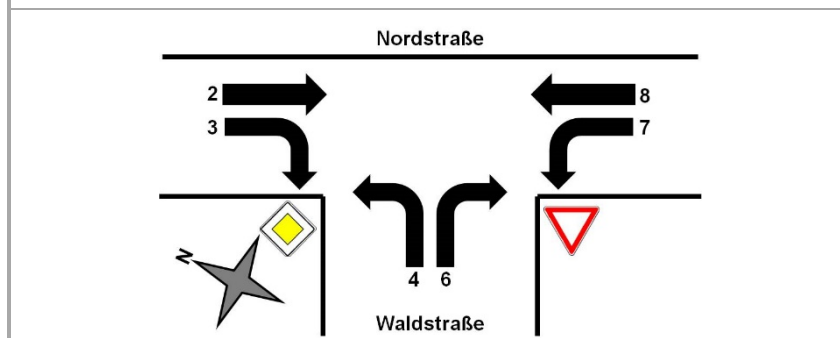
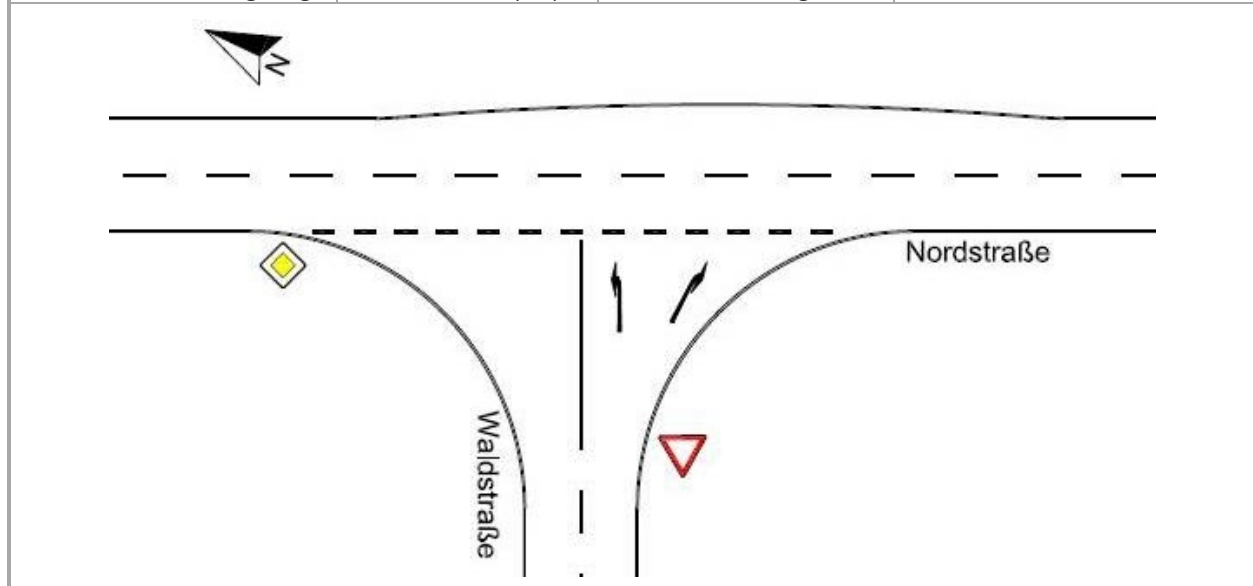


Vergleich der Wartezeiten



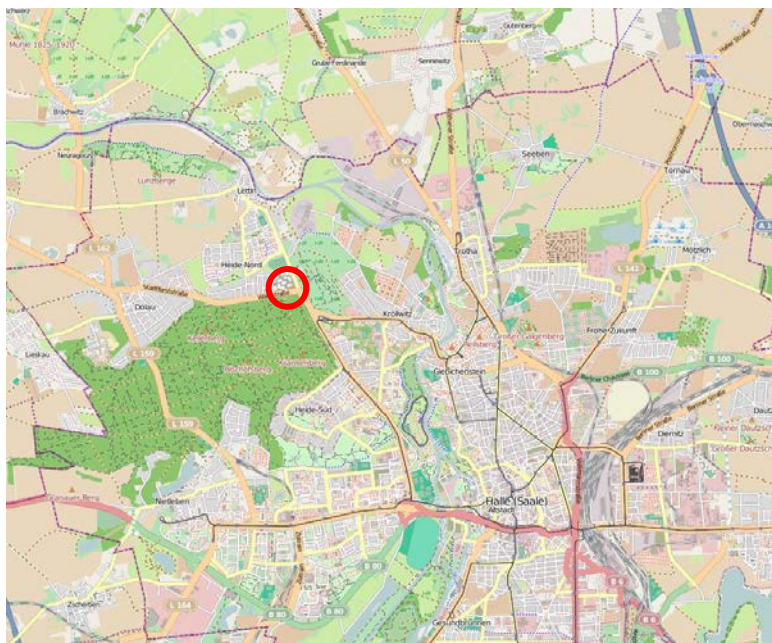
Nordstraße / Waldstraße (Halle/S.)

Typ:	VZ	Arme:	3	Lage:	innerorts
Erhebungstag:	11.10.2012 (Do)	Erhebungszeit:	14:30 – 17:30 Uhr		



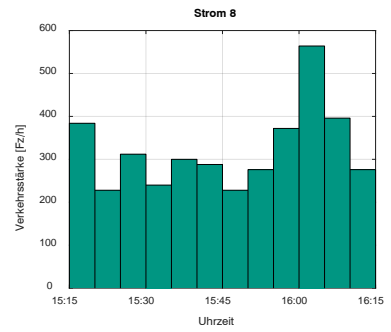
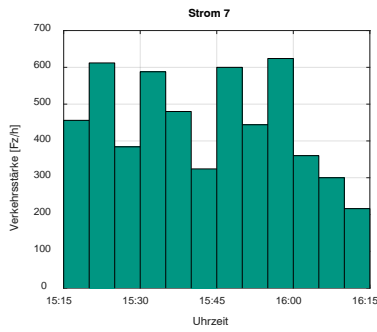
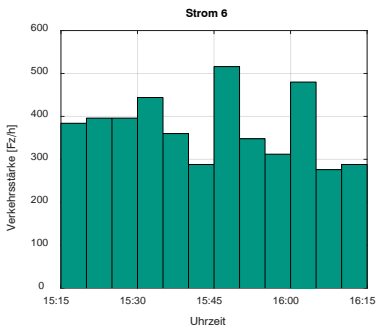
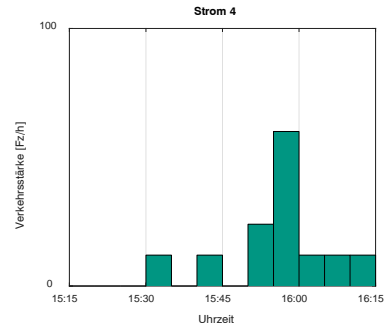
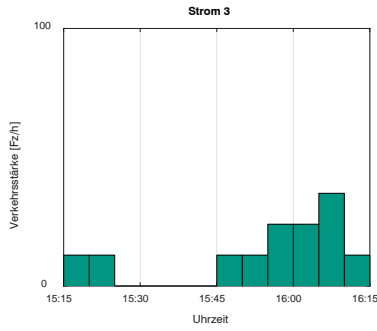
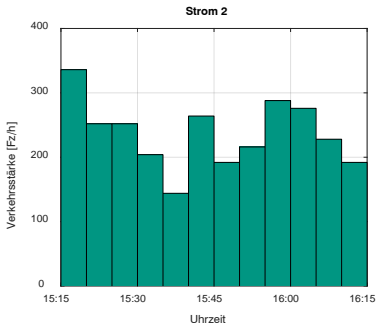
Charakteristik:

- $V_{zul(HR)}$: 30 km/h
- $V_{zul(NR)}$: 50 km/h
- Beginn Auswertung: 15:15 Uhr
- Q_{spitze} : 1406 Fz/h
- Verkehrsknoten
- Linienbusverkehr in HR
- Parallelaufstellung in NR möglich
- Überholen von Strom 7 durch Strom 8 möglich

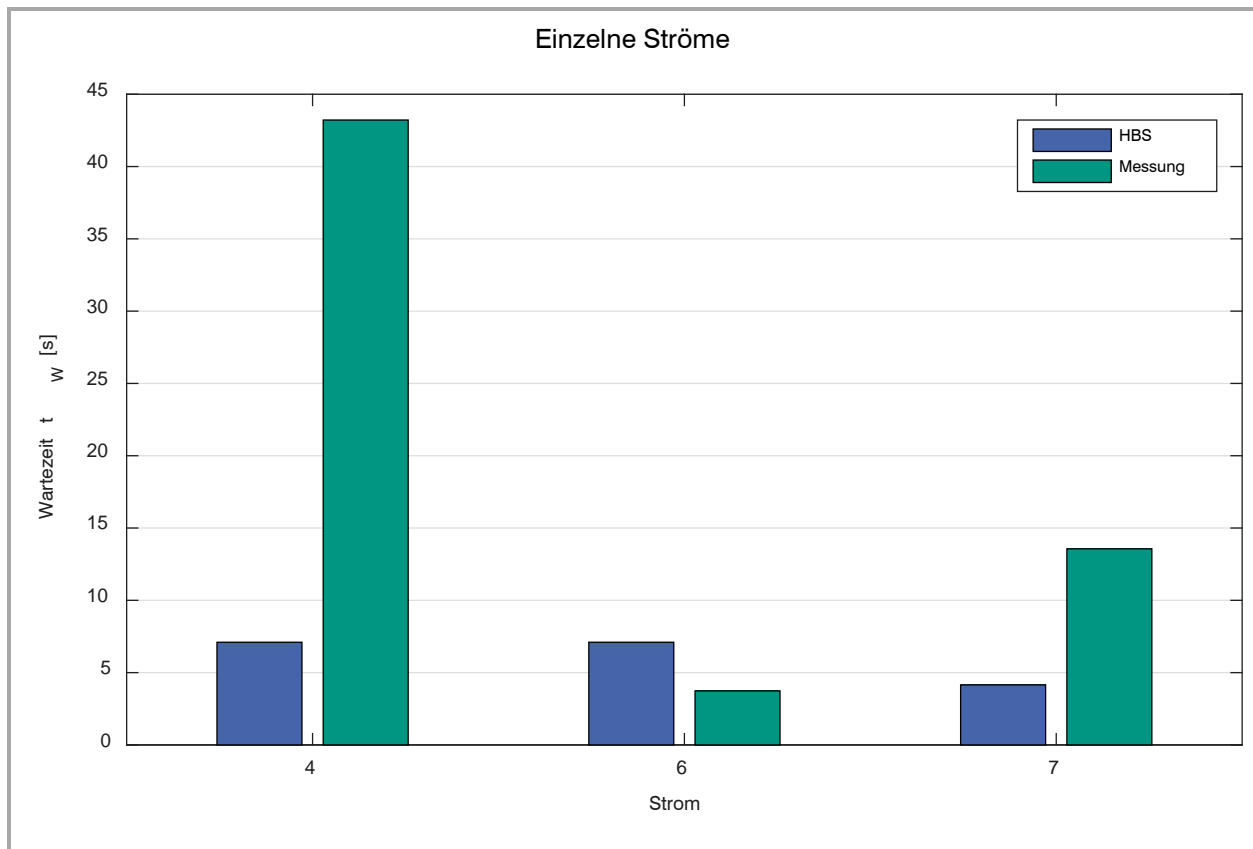


Erhobene Verkehrsstärke

Einzelne Ströme

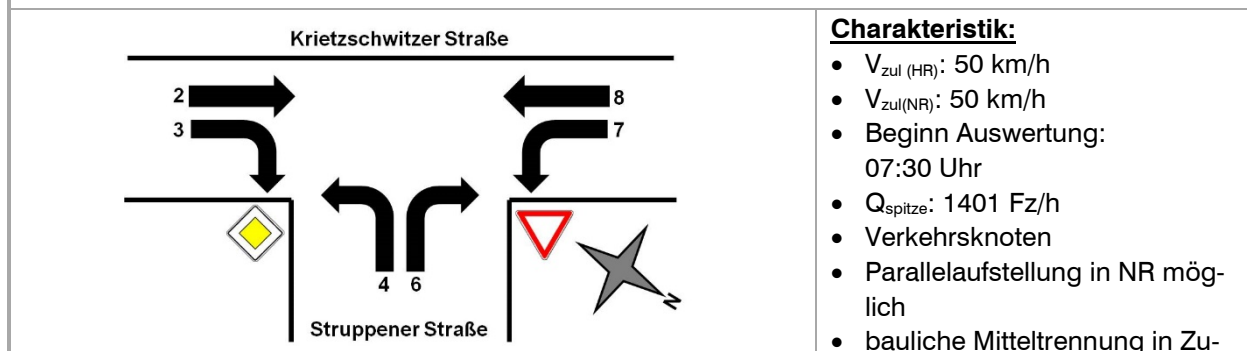
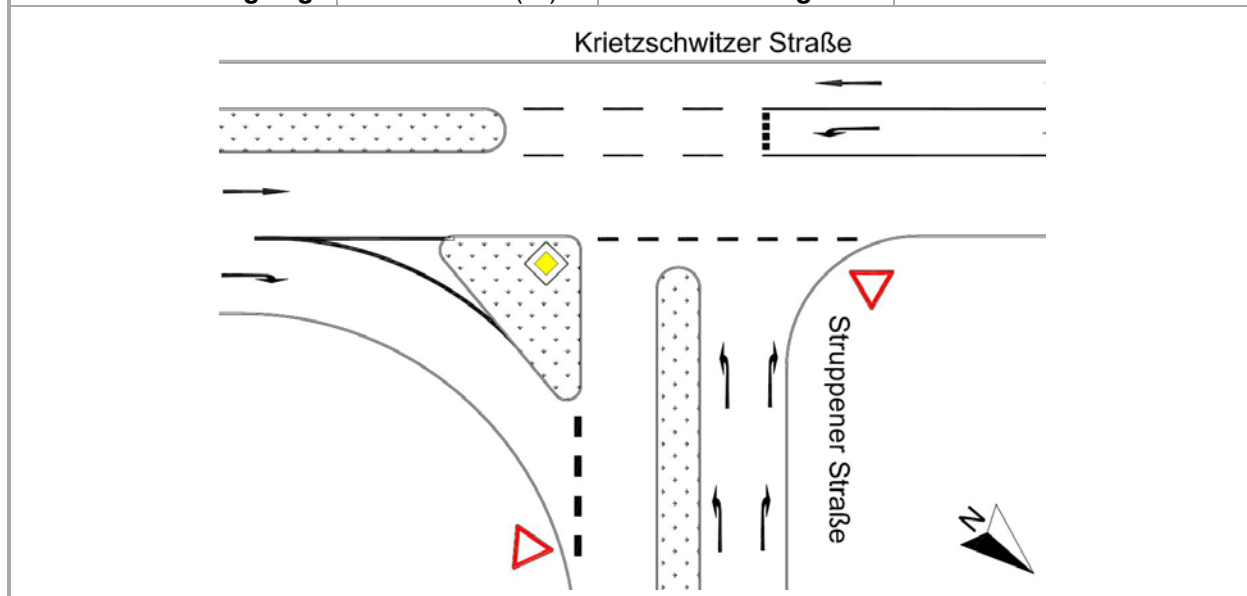


Vergleich der Wartezeiten



Krietzschwitzer Straße / Struppener Straße (Pirna)

Typ:	VZ	Arme:	3	Lage:	innerorts
Erhebungstag:	08.08.2012 (Mi)	Erhebungszeit:	07:30 – 10:30 Uhr		



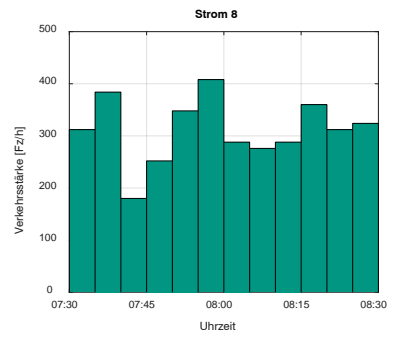
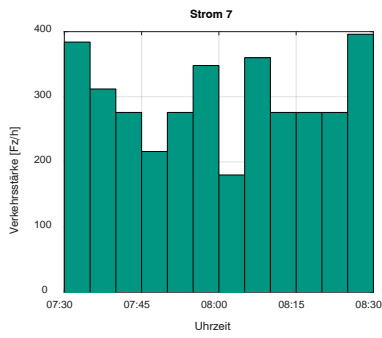
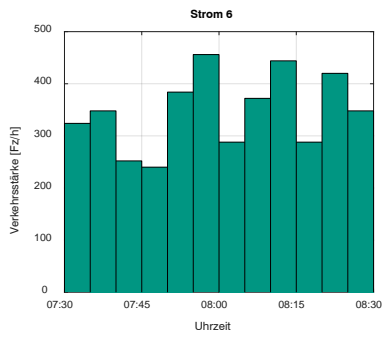
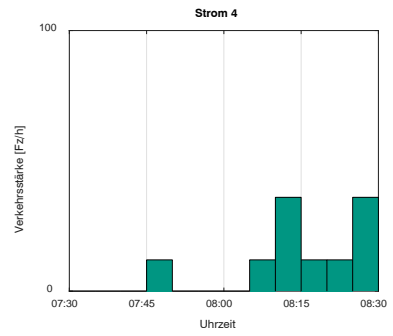
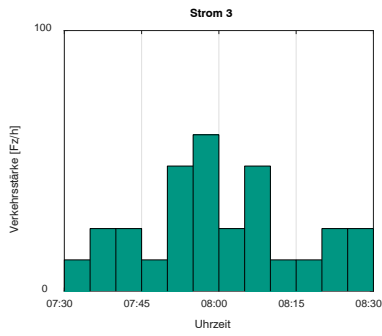
Charakteristik:

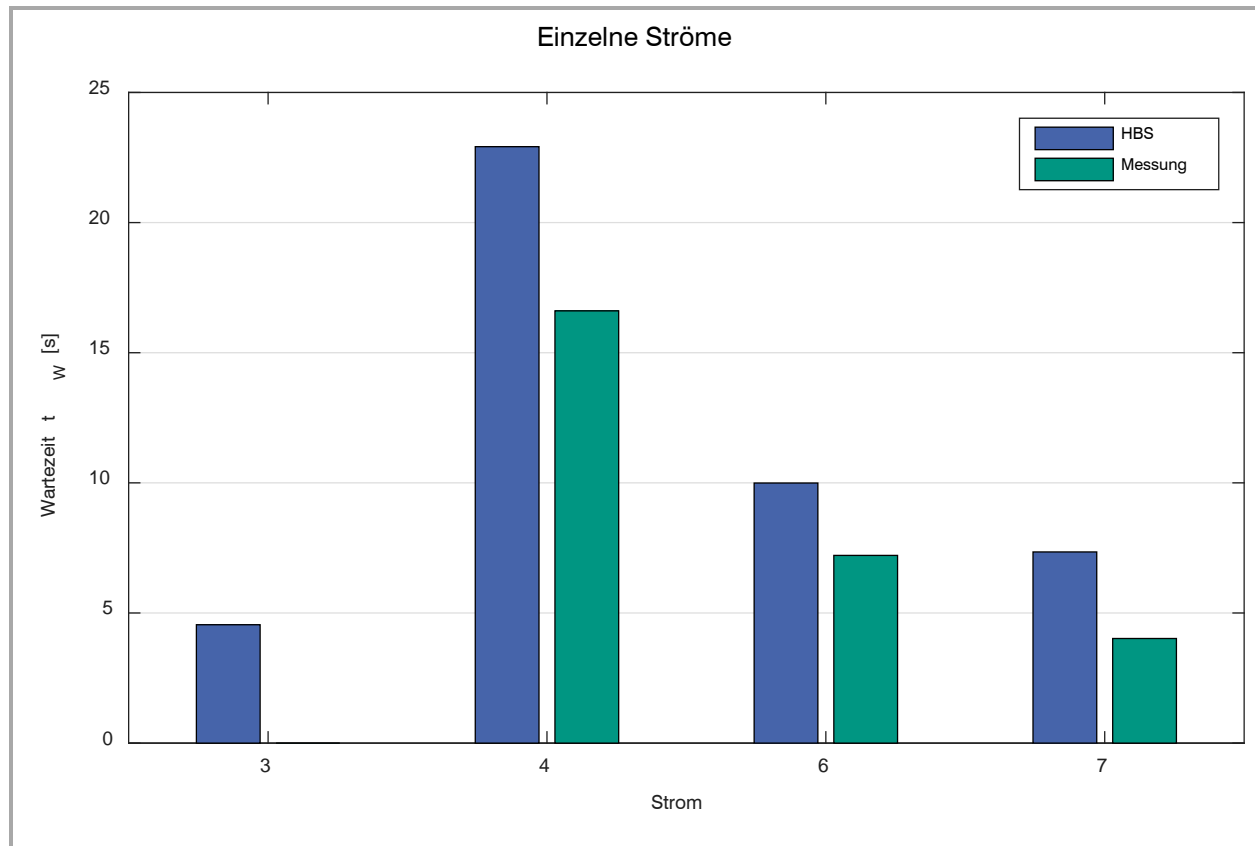
- $V_{zul(HR)}$: 50 km/h
- $V_{zul(NR)}$: 50 km/h
- Beginn Auswertung: 07:30 Uhr
- Q_{spitze} : 1401 Fz/h
- Verkehrsknoten
- Parallelaufstellung in NR möglich
- bauliche Mitteltrennung in Zufahrt Süd
- Mittelinsel in NR
- Dreiecksinsel mit anschließender vorfahrrechtlicher Unterordnung in Strom 3



Erhobene Verkehrsstärke

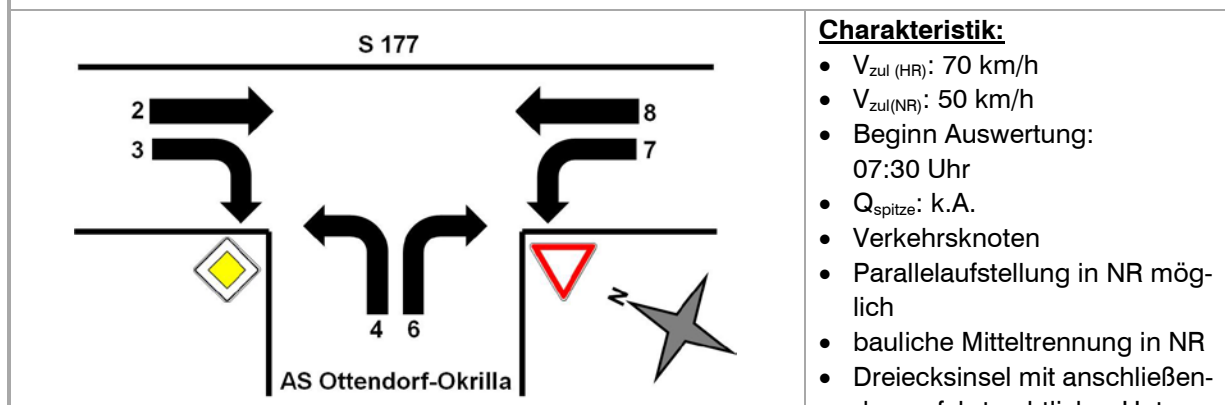
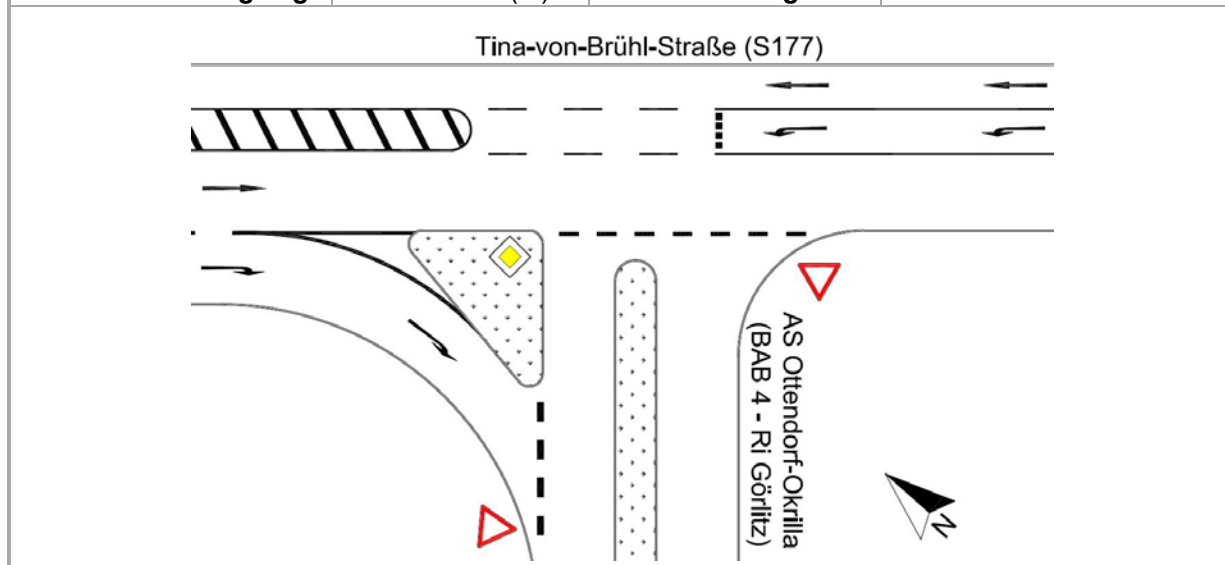
Einzelne Ströme



Vergleich der Wartezeiten

S 177 / AS Ottendorf-Okrilla (BAB 4 – Ri Görnitz)

Typ:	VZ	Arme:	3	Lage:	außerorts
Erhebungstag:	09.10.2012 (Di)	Erhebungszeit:	07:15 – 10:00 Uhr		



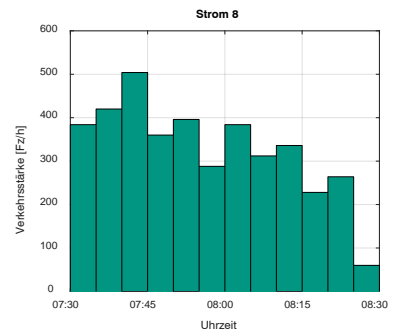
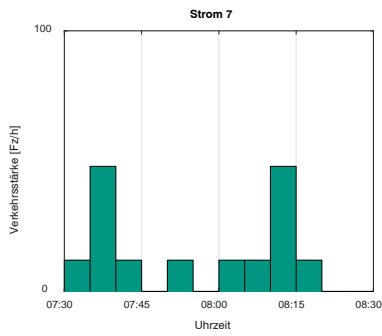
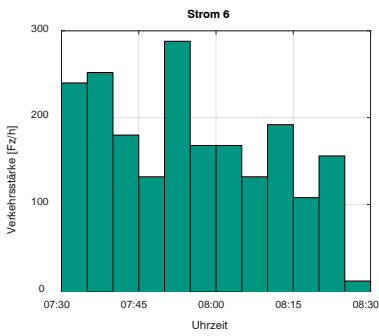
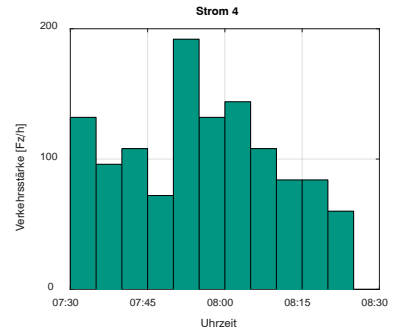
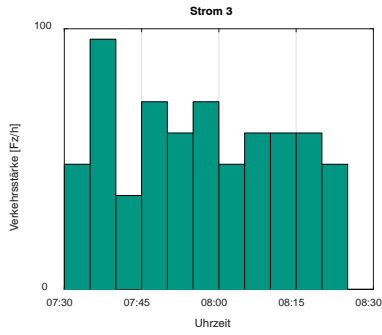
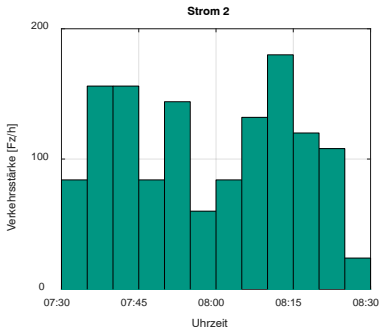
Charakteristik:

- $V_{zul(HR)}$: 70 km/h
- $V_{zul(NR)}$: 50 km/h
- Beginn Auswertung: 07:30 Uhr
- Q_{spitze} : k.A.
- Verkehrsknoten
- Parallelaufstellung in NR möglich
- bauliche Mitteltrennung in NR
- Dreiecksinsel mit anschließender vorfahrtsrechtlicher Unterordnung in Strom 3



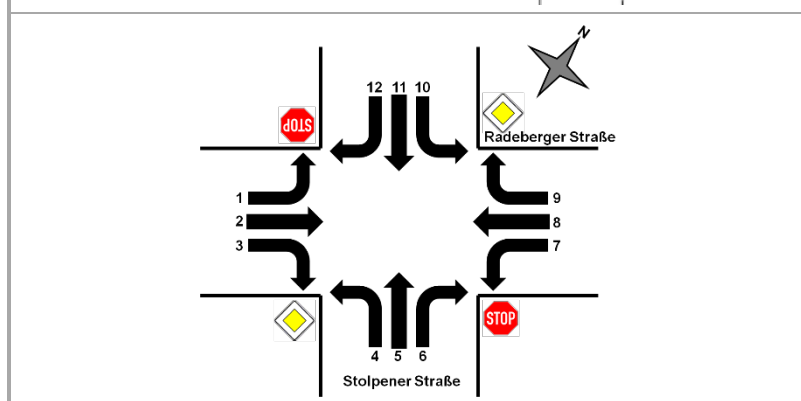
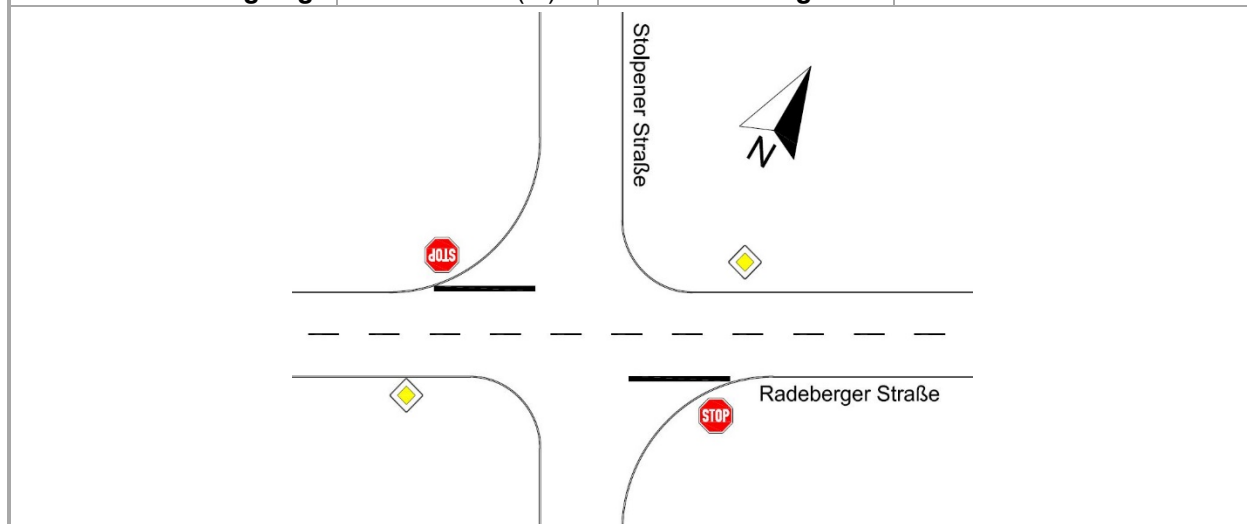
Erhobene Verkehrsstärke

Einzelne Ströme



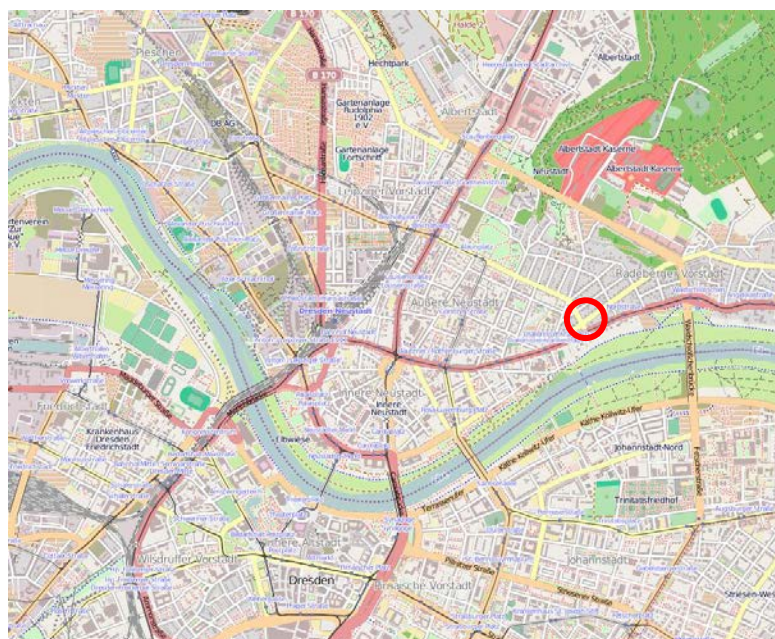
Radeberger Straße / Stolpener Straße (Dresden)

Typ:	VZ	Arme:	4	Lage:	innerorts
Erhebungstag:	09.10.2012 (Di)	Erhebungszeit:	15:00 – 18:00 Uhr		



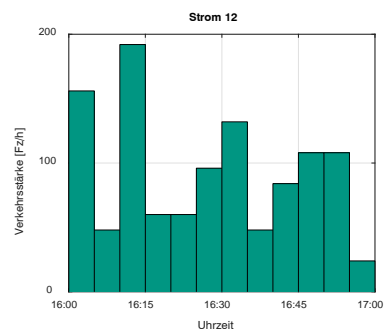
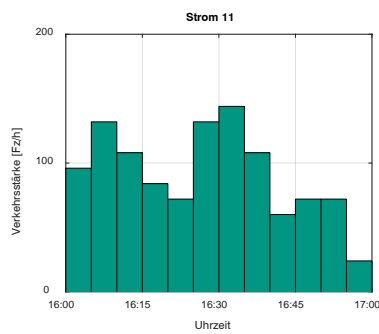
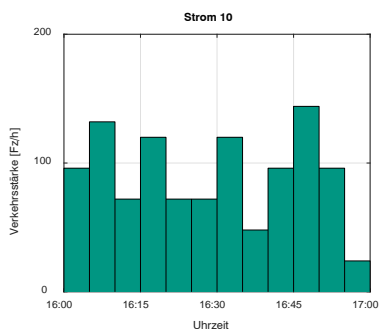
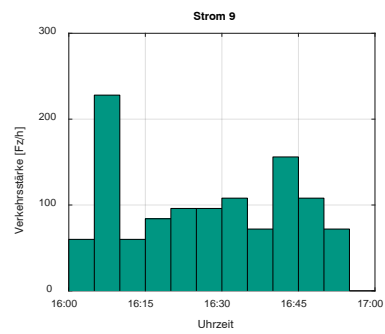
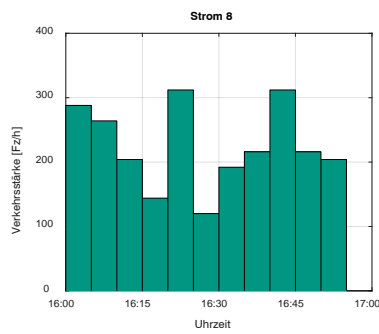
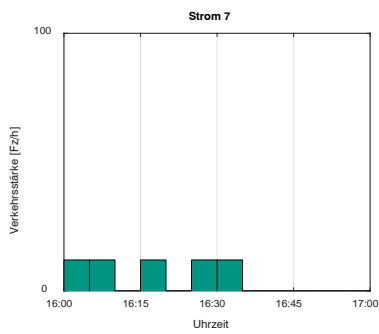
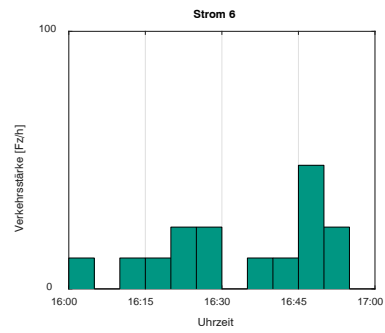
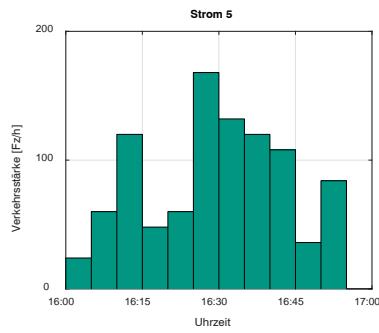
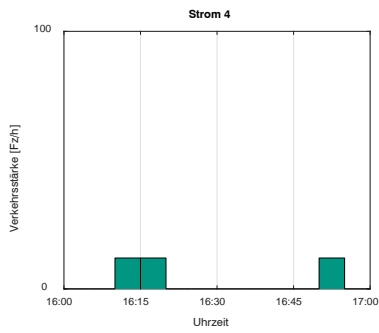
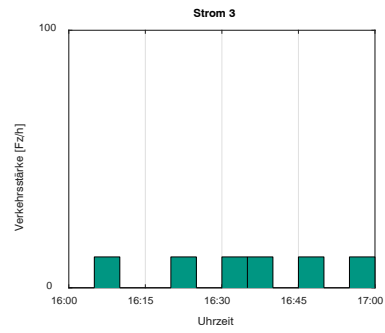
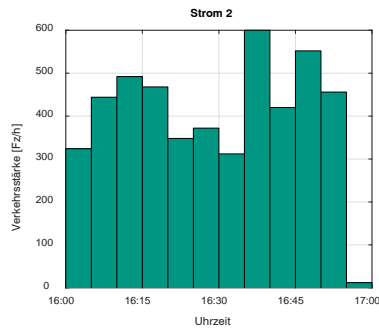
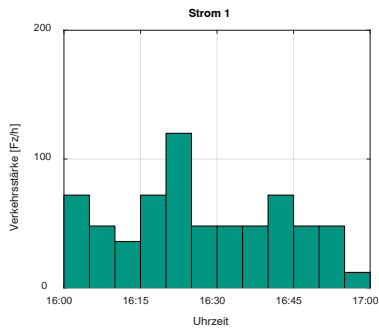
Charakteristik:

- $V_{zul} (HR)$: 50 km/h
- $V_{zul} (NR)$: 50 km/h
- **Beginn Auswertung:**
16:00 Uhr
- Q_{spitze} : 1142 Fz/h
- Anschlussknoten
- Parallelaufstellung in NR möglich
- ausschließlich Mischfahrstreifen
- Z 206 in NR

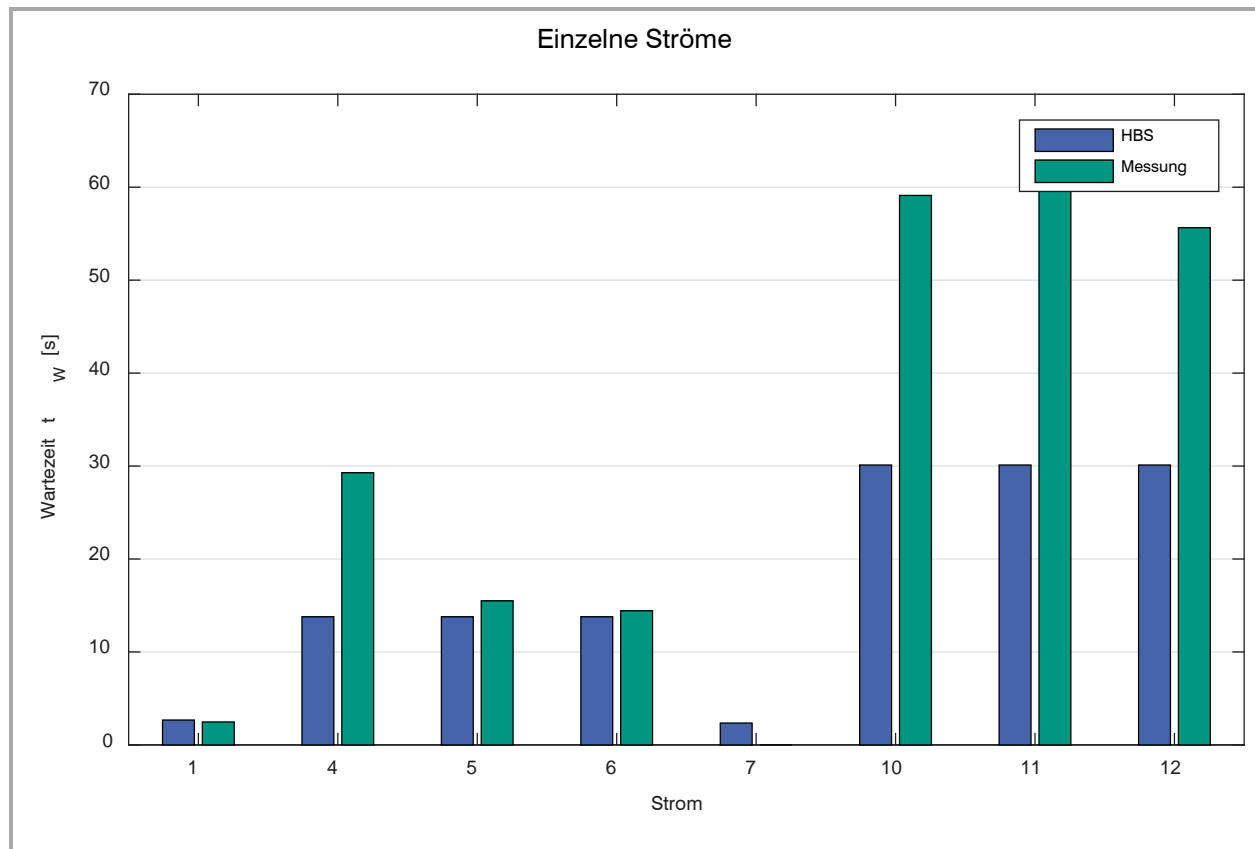


Erhobene Verkehrsstärke

Einzelne Ströme

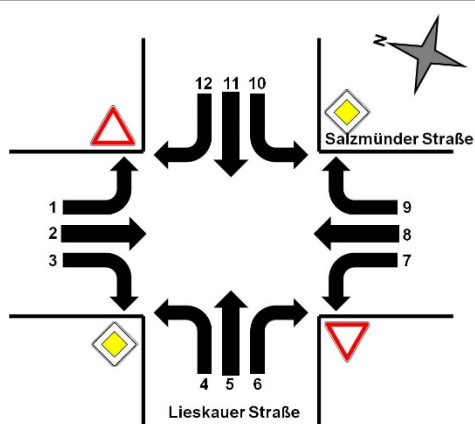
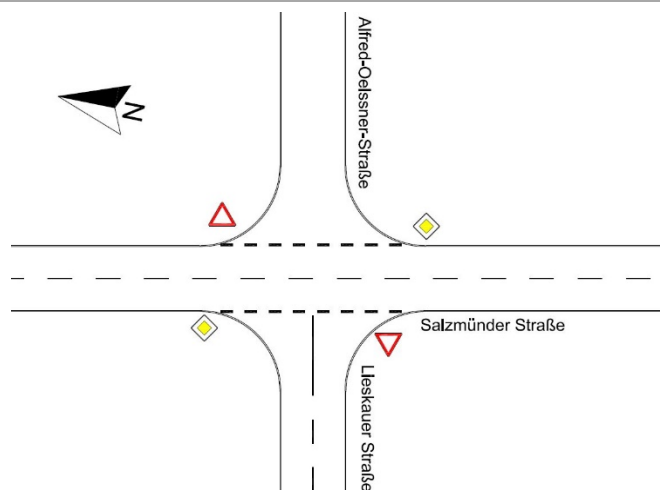


Vergleich der Wartezeiten



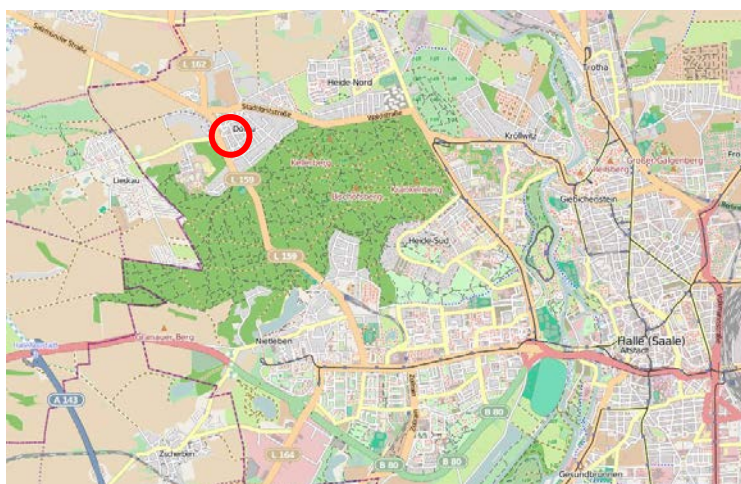
Salzmünder Straße / Lieskauer Straße (Halle/S.)

Typ:	VZ	Arme:	4	Lage:	innerorts
Erhebungstag:	11.10.2012 (Do)	Erhebungszeit:	07:20 – 10:20 Uhr		



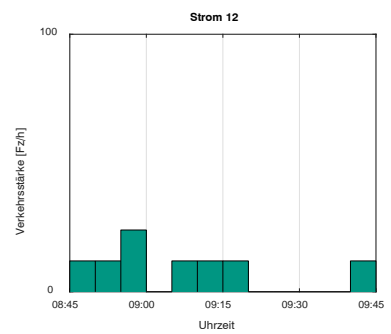
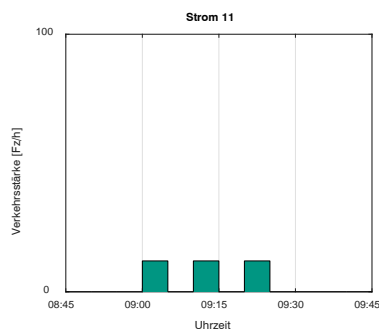
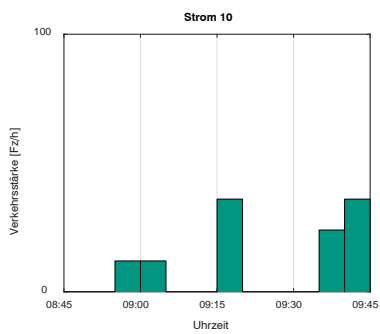
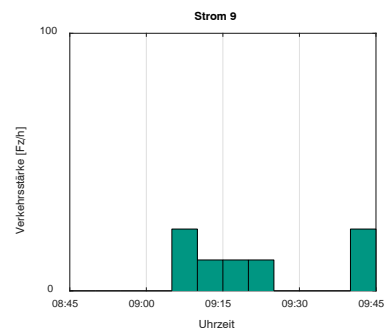
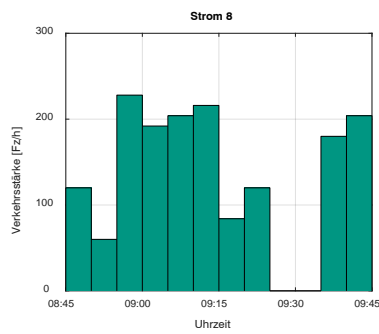
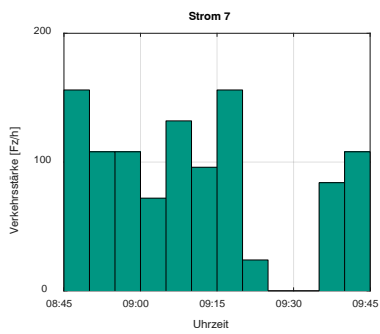
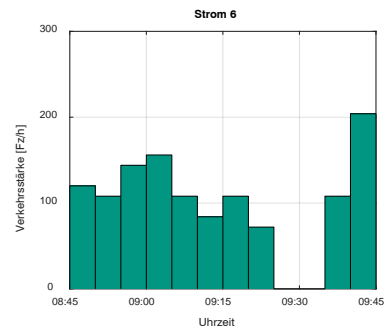
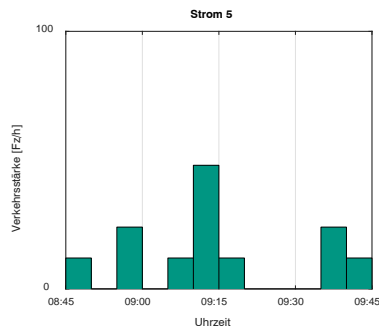
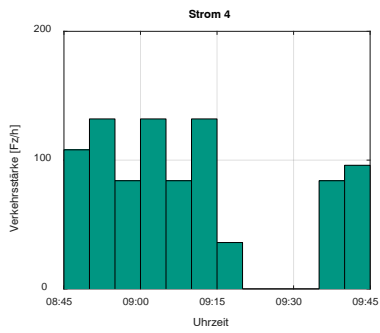
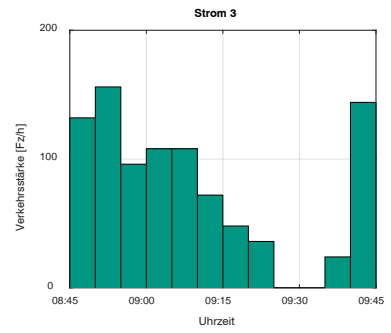
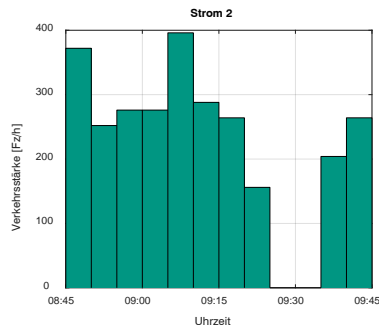
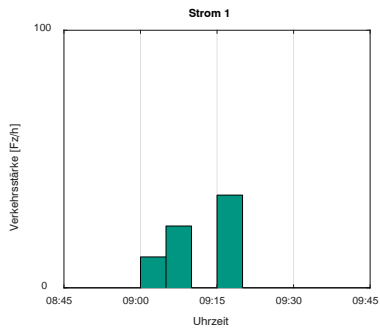
Charakteristik:

- $V_{zul} (HR)$: 50 km/h
- $V_{zul} (NR)$: 50 km/h
- Beginn Auswertung:
08:45 Uhr
- Q_{spitze} : 747 Fz/h
- Verkehrsknoten
- Parallelaufstellung in NR möglich

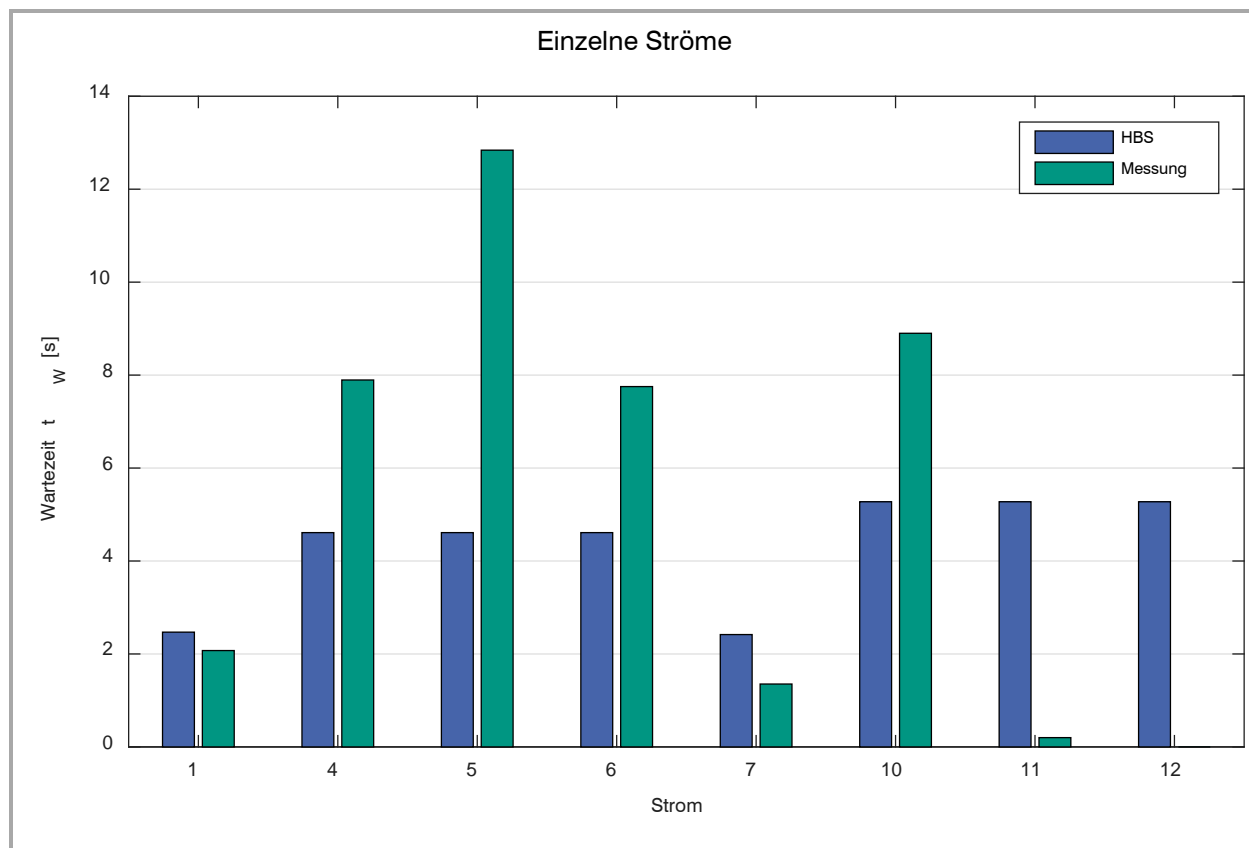


Erhobene Verkehrsstärke

Einzelne Ströme



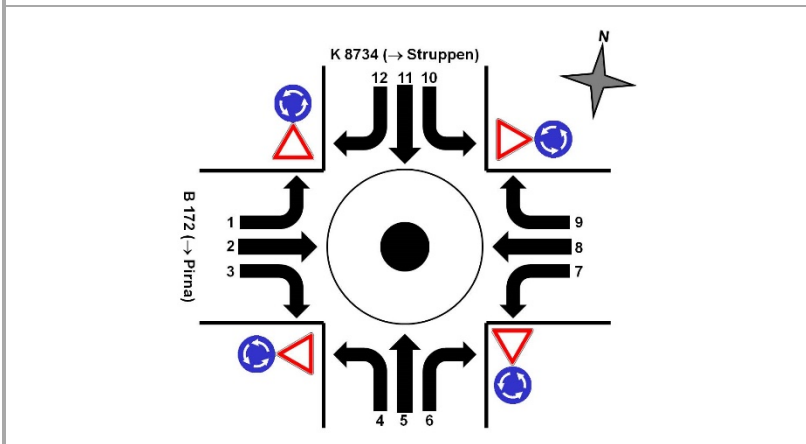
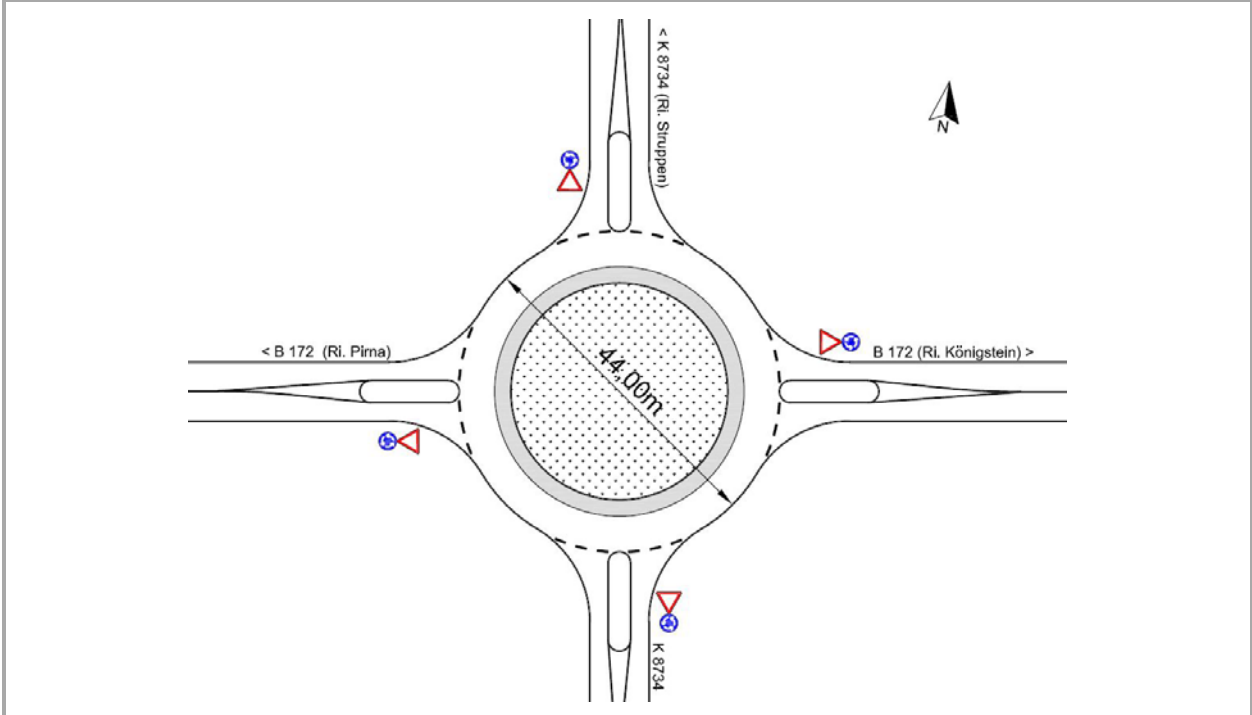
Vergleich der Wartezeiten



Anhang III: Kreisverkehrsplätze

B 172 / K 8734

Typ:	KVP	Arme:	4	Lage:	außerorts
Erhebungstag:	19.09.2012 (Mi)	Erhebungszeit:	15:45 – 18:30 Uhr		

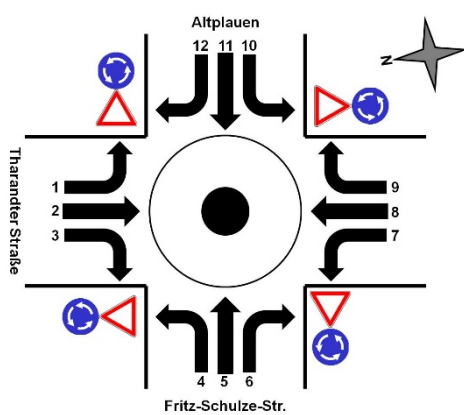
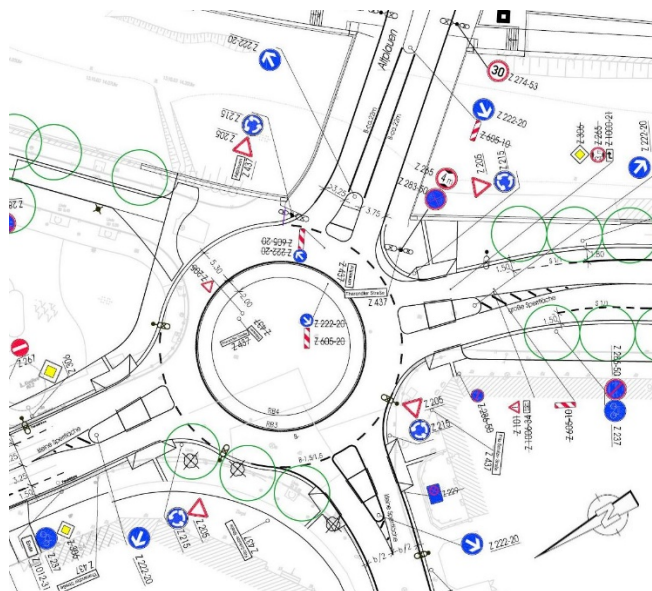


- Charakteristik:**
- $V_{zul(HR)}$: 50 km/h
 - $V_{zul(NR)}$: 50 km/h
 - DTV₂₀₁₁: k.A.
 - Mittelinseln in allen Zufahrten



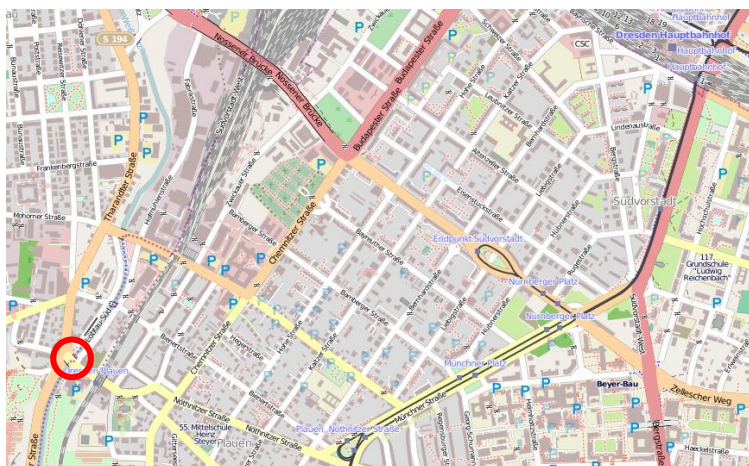
Tharandter Straße / Altplauen (Dresden)

Typ:	KVP	Arme:	4	Lage:	innerorts
Erhebungstag:	02.10.2012 (Di)	Erhebungszeit:	07:00 – 10:00 Uhr		



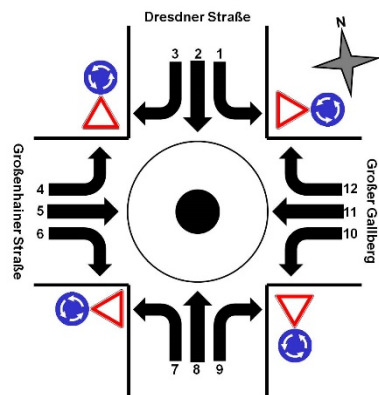
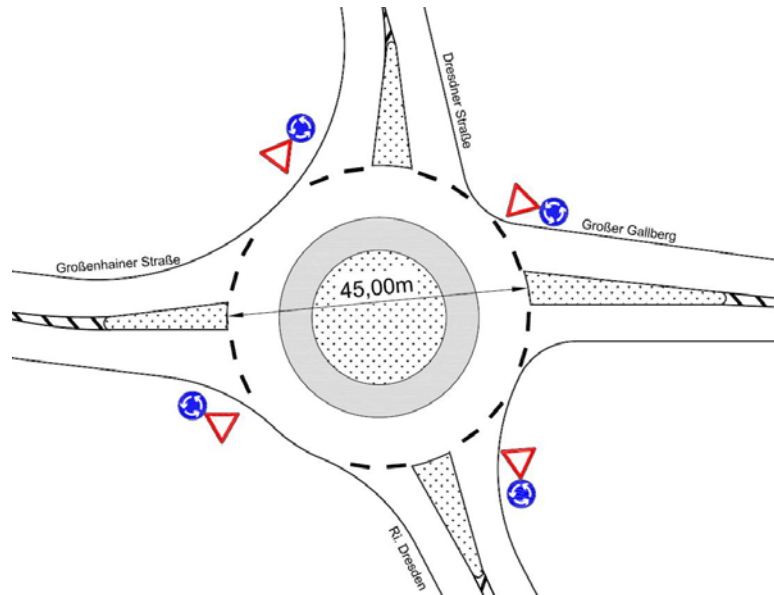
Charakteristik:

- $V_{zul(HR)}$: 50 km/h
- $V_{zul(NR)}$: 50 km/h
- DTV₂₀₁₁: k.A.
- Verkehrsknoten
- Mittelinseln in allen Zufahrten
- Linienbusverkehr



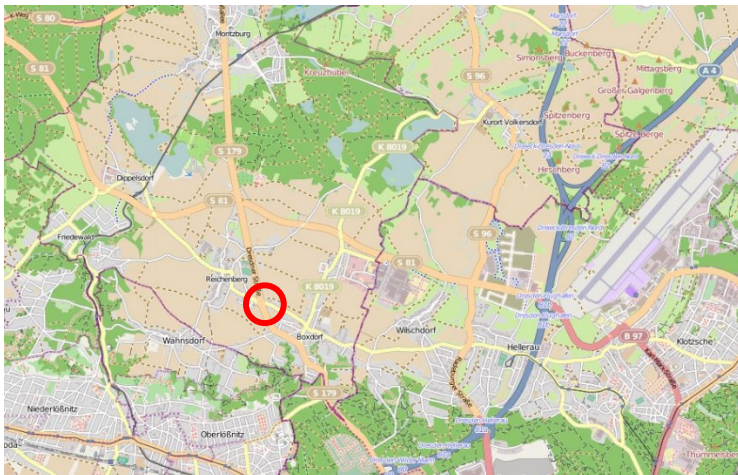
Dresdner Straße / Großenhainer Straße (Reichenberg)

Typ:	KVP	Arme:	4	Lage:	innerorts
Erhebungstag:	20.07.2013 (Sa)	Erhebungszeit:	14:00 – 17:00 Uhr		



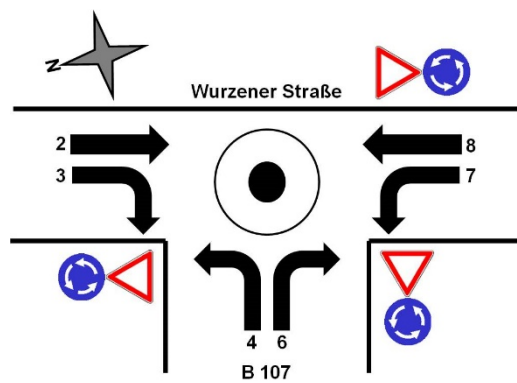
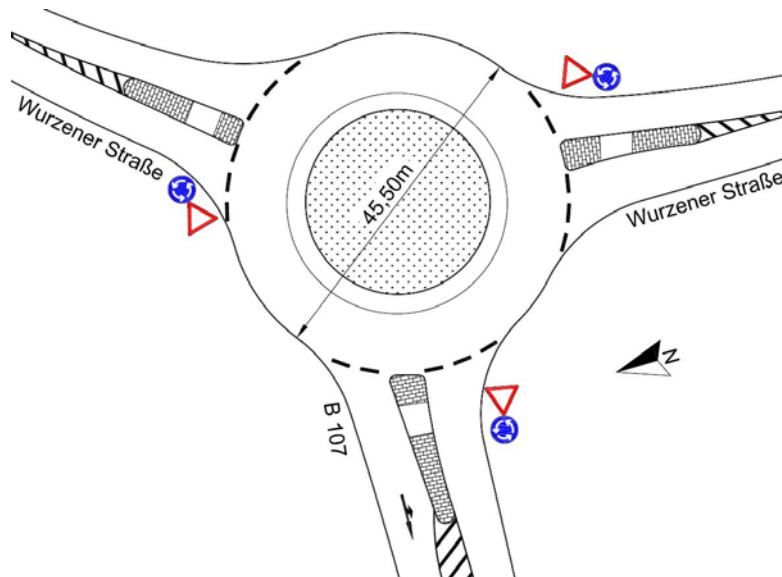
Charakteristik:

- $V_{zul(HR)}$: 50 km/h
- $V_{zul(NR)}$: 50 km/h
- DTV_{2011} : k.A.
- Verkehrsknoten
- Mittelinseln in allen Zufahrten
- Linienbusverkehr (regional)



Wurzener Straße / B 107 (Grimma)

Typ: KVP **Arme:** 3 **Lage:** innerorts
Erhebungstag: 20.09.2012 (Do) **Erhebungszeit:** 07:15 – 10:00 Uhr



Charakteristik:

- $V_{zul} (HR)$: 50 km/h
- $V_{zul} (NR)$: 50 km/h
- DTV_{2011} : k.A.
- Verkehrsknoten
- Mittellinseln in allen Zufahrten
- Linksabbiegefahrstreifen im Ausfahrbereich des westlichen Knotenarmes (B107)

